

BEFORE THE STATE CORPORATION COMMISSION
OF THE STATE OF KANSAS

IN THE MATTER OF THE APPLICATION)
OF ATMOS ENERGY CORPORATION) Docket No.
FOR REVIEW AND ADJUSTMENT OF ITS) 19-ATMG-525-RTS
NATURAL GAS RATES)

DIRECT TESTIMONY OF NED W. ALLIS

1 **I. INTRODUCTION**

2 **Q. PLEASE STATE YOUR NAME AND BUSINESS ADDRESS.**

3 A. My name is Ned W. Allis. I am Vice President at Gannett Fleming Valuation and
4 Rate Consultants, LLC. My business address is 207 Senate Avenue, Camp Hill,
5 Pennsylvania, 17011.

6 **II. EXECUTIVE SUMMARY**

7 My testimony presents the depreciation study conducted by my firm for
8 Atmos Energy Corporation (“Atmos Energy” or “Company”) of the Company’s
9 Kansas Division assets. The depreciation expense calculated in the Company’s
10 revenue requirement utilizing my proposed depreciation rates is being sponsored
11 by Company witness, Ms. Jennifer K. Story. The depreciation study was conducted
12 with generally accepted depreciation practices and sets forth annual depreciation
13 rates for each depreciable group of property. The depreciation study, provided as
14 Exhibit NWA-1, sets forth the recommended survivor curves, net salvage percents
15 and recommended depreciation rates for each depreciable group of property. The
16 study was based on the straight line method, equal life group (“ELG”) procedure
17 and remaining life technique. The use of the equal life group procedure is a change
18 from the procedure used for the current depreciation rates, which are based on a

1 settlement agreement.¹ The other methods and procedures are the same as used in
2 the previous depreciation study.

3 The recommended survivor curves in the study are based on actuarial life
4 analysis. In previous depreciation studies, semi-actuarial methods were used due
5 in part to the available data at the time of these studies. The recommended net
6 salvage estimates are made in a manner consistent with the previous depreciation
7 study and incorporate changes to the accounting for cost of removal based on time
8 and motion studies conducted subsequent to the previous depreciation study.

9 **III. INTRODUCTION AND PURPOSE OF TESTIMONY**

10 **Q. PLEASE DESCRIBE YOUR EDUCATIONAL AND PROFESSIONAL
11 BACKGROUND.**

12 A. I graduated in 2002 with a Bachelor's of Science degree in Mathematics from
13 Lafayette College. I joined Gannett Fleming in October 2006 as an analyst. My
14 responsibilities included assembling data required for depreciation studies,
15 conducting statistical analyses of service life and net salvage data, calculating
16 annual and accrued depreciation, and assisting in preparing reports and testimony
17 setting forth and defending the results of the studies. I also developed and
18 maintained Gannett Fleming's proprietary depreciation software. In March 2013,
19 I was promoted to the position of Supervisor of Depreciation Studies. In March
20 2017, I was promoted to Project Manager, Depreciation and Technical
21 Development. In January 2019, I was promoted to my current position of Vice

¹ *Order Granting Joint Motion to Approve Stipulation and Agreement*, Docket No. 12-ATMG-564-RTS (Aug. 22, 2012).

1 President. Since joining Gannett Fleming, I have worked on more than one hundred
2 depreciation assignments.

3 **Q. WHAT ARE YOUR DUTIES IN YOUR CURRENT ROLE?**

4 A. In my position as Vice President I am responsible for conducting depreciation,
5 valuation, and original cost studies; determining service life and salvage estimates;
6 conducting field reviews; presenting recommended depreciation rates to clients;
7 and supporting such rates before state and federal regulatory agencies. I am also
8 responsible for Gannett Fleming's depreciation software, training of depreciation
9 staff, and the development of solutions for technical issues related to depreciation.

10 **Q. HAVE YOU PREVIOUSLY SUBMITTED TESTIMONY BEFORE THE
11 COMMISSION?**

12 A. No. However, I have submitted testimony related to depreciation in over 30 cases
13 before ten other regulatory jurisdictions.

14 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY IN THIS
15 PROCEEDING?**

16 A. I describe the depreciation study conducted by my firm, which is presented as
17 Exhibit NWA-1.

18 **Q. WHAT EXHIBITS ARE YOU PROVIDING IN THIS PROCEEDING?**

19 A. Yes. I am providing the following Exhibits:
20 • Exhibit NWA-1: Depreciation Study
21 • Exhibit NWA-2: Qualifications of Ned W. Allis

1 **Q. WHAT IS THE PURPOSE OF YOUR TESTIMONY?**

2 A. My testimony will support and explain the depreciation study performed for Atmos
3 Energy's Kansas Division gas plant ("Depreciation Study"), attached hereto as
4 Exhibit NWA-1. The Depreciation Study sets forth the calculated annual
5 depreciation accrual rates by account as of September 30, 2018.

6 **Q. PLEASE SUMMARIZE THE RESULTS OF THE DEPRECIATION STUDY.**

7 A. The depreciation rates set forth in the Depreciation Study as of September 30, 2018
8 appropriately reflect the rates at which the full cost of Atmos Energy's Kansas
9 assets should be recovered through depreciation expense. Such rates are based on
10 commonly used methods and procedures for determining depreciation rates. The
11 service life and net salvage parameters are based on widely used methods. The
12 depreciation rates are based on the ELG procedure, remaining life technique, and
13 straight line method. The recommended service life estimates are based on
14 informed judgment that incorporates actuarial life analysis based on the retirement
15 rate method. The net salvage estimates are based on generally accepted and widely
16 used methods.

17 **IV. DEPRECIATION STUDY**

18 **Q. PLEASE DEFINE THE CONCEPT OF DEPRECIATION.**

19 A. The Federal Energy Regulatory Commission's Uniform System of Accounts
20 Prescribed for Natural Gas Companies Subject to the Provisions of the Natural Gas
21 Act defines depreciation as follows:

22 Depreciation, as applied to depreciable gas plant, means the loss in
23 service value not restored by current maintenance, incurred in
24 connection with the consumption or prospective retirement of gas
25 plant in the course of service from causes which are known to be in

1 current operation and against which the utility is not protected by
2 insurance. Among the causes to be given consideration are wear and
3 tear, decay, action of the elements, inadequacy, obsolescence,
4 changes in the art, changes in demand and requirements of public
5 authorities, and, in the case of natural gas companies, the exhaustion
6 of natural resources.²

7 **Q. DID YOU PREPARE THE DEPRECIATION STUDY SUBMITTED BY**
8 **ATMOS ENERGY KANSAS IN THIS PROCEEDING?**

9 A. Yes. I prepared Atmos Energy's Depreciation Study, which is provided as Exhibit
10 NWA-1.

11 **Q. IN COMPLETING THE DEPRECIATION STUDY, DID YOU FOLLOW**
12 **GENERALLY ACCEPTED PRACTICES IN THE FIELD OF**
13 **DEPRECIATION?**

14 A. Yes.

15 **Q. WHAT IS THE PURPOSE OF THE DEPRECIATION STUDY?**

16 A. The purpose of the Depreciation Study is to estimate the annual depreciation rates
17 and accruals for Atmos Energy's plant in service for financial and ratemaking
18 purposes, and to determine appropriate average service lives, survivor curves, and
19 net salvage percentages for each plant account.

20 **Q. ARE THE METHODS AND PROCEDURES OF THIS DEPRECIATION**
21 **STUDY CONSISTENT WITH ATMOS ENERGY'S PAST PRACTICES?**

22 A. The Depreciation Study uses the same method, procedure and technique for
23 calculating depreciation as used in the previous depreciation study. The
24 Depreciation Study is based on the straight line method, ELG procedure and

² 18 C.F.R. § 201, Definition 12B.

1 remaining life technique. The current depreciation rates are based on a settlement
2 agreement which incorporated some modifications to the Company's proposed
3 depreciation rates. As a result, the use of the ELG procedure is a change from the
4 procedure used for Atmos Energy's current depreciation rates. It is, however,
5 consistent with previous studies proposed by the Company in Kansas and within its
6 other operating divisions, such as, Texas, Colorado, and Mississippi.

7 The retirement rate method, which is an actuarial method of analyzing
8 historical retirement data, was used for the study. In previous studies, semi-
9 actuarial methods were used due in part to the data that was available. The
10 retirement rate method, which is described in more detail later in this testimony and
11 in the Depreciation Study, is the predominant method used when aged data is
12 available (i.e., when the vintage year of transactions is known). The method used
13 to estimate net salvage, in which historical cost of removal and gross salvage are
14 expressed as a ratio of retirements, is also widely used in the industry and is the
15 predominant approach used for estimating future net salvage.

16 **Q. WHAT ARE THE COMPONENTS OF THE DEPRECIATION STUDY?**

17 A. The Depreciation Study is presented in the following nine parts: Part I
18 (Introduction) presents the scope and basis for the Depreciation Study. Part II
19 (Estimation of Survivor Curves) includes descriptions of the methodology of
20 estimating survivor curves. Part III (Service Life Considerations) and Part IV (Net
21 Salvage Considerations) set forth the process for determining service life and net
22 salvage estimates. Part V (Calculation of Annual and Accrued Depreciation)
23 includes the concepts of depreciation and amortization using the remaining life.

1 Part VI (Results of Study) presents a description of the results of my analysis and a
2 summary of the depreciation calculations. Part VI also presents in Table 1 (see Part
3 VI, pages VI-4 through VI-6) the estimated survivor curve, the net salvage percent,
4 the original cost as of September 30, 2018, the book depreciation reserve, and the
5 calculated annual depreciation accrual and rate for each account or subaccount.
6 Parts VII, VIII, and IX include graphs and tables that relate to the service life and
7 net salvage analyses, and the detailed depreciation calculations by account. The
8 section beginning on Part VIII, page VIII-2 presents the results of the salvage
9 analysis. The section beginning on Part IX, page IX-2 presents the depreciation
10 calculations related to surviving original cost as of September 30, 2018.

11 **Q. HOW DID YOU PERFORM THE DEPRECIATION STUDY?**

12 A. For the depreciation rates, I used the straight line remaining life method of
13 depreciation, also referred to as the straight line method and remaining life
14 technique, with the ELG procedure. The annual depreciation is based on a method
15 of depreciation accounting that seeks to distribute the unrecovered cost of fixed
16 capital assets over the estimated remaining useful life of each unit, or group of
17 assets, in a systematic and rational manner.

18 For the amortization of General Plant Accounts 391.00, 393.00, 394.00,
19 395.00, 397.00, 397.02, 398.00, 399.01, 399.02, 399.03, 399.06, 399.07 and
20 399.08, I used the straight line remaining life method of amortization. The annual
21 amortization is based on amortization accounting that distributes the unrecovered
22 cost of fixed capital assets over the remaining amortization period selected for each
23 account and vintage. Amortization accounting is currently used for these accounts,

1 although the recommended amortization periods for certain accounts are different
2 from the current amortization periods to better align the lives of these assets with
3 the expectations of the assets and the lives of others in the industry. Amortization
4 accounting is also proposed for the new Distribution Accounts 376.03 - Anodes and
5 376.04 - Leak Clamps.

6 **Q. HOW DID YOU DETERMINE THE RECOMMENDED ANNUAL**
7 **DEPRECIATION ACCRUAL RATES?**

8 A. I did this in two phases. In the first phase, I estimated the service life and net
9 salvage characteristics for each depreciable group - that is, each plant account or
10 subaccount identified as having similar characteristics. In the second phase, I
11 calculated the composite remaining lives and annual depreciation accrual rates
12 based on the service life and net salvage estimates determined in the first phase.

13 **Q. PLEASE FURTHER DESCRIBE THE FIRST PHASE OF THE**
14 **DEPRECIATION STUDY, IN WHICH YOU ESTIMATED THE SERVICE**
15 **LIFE AND NET SALVAGE CHARACTERISTICS FOR EACH**
16 **DEPRECIABLE GROUP.**

17 A. The service life and net salvage study consisted of compiling historical data from
18 records related to Atmos Energy's gas plant; analyzing such data to obtain historical
19 trends of survivor characteristics; obtaining supplementary information from
20 Atmos Energy's management and operating personnel concerning practices and
21 plans as they relate to plant operations; and interpreting the data and the estimates
22 used by other gas utilities to form judgments of service life and net salvage
23 characteristics.

1 **Q. WHAT HISTORICAL DATA DID YOU ANALYZE FOR THE PURPOSE OF**
2 **ESTIMATING SERVICE LIFE CHARACTERISTICS?**

3 A. I analyzed Atmos Energy's accounting entries that record plant transactions during
4 the period 1926 through 2018, to the extent available, although the earliest year of
5 data varied by account. The transactions I analyzed included additions, retirements,
6 transfers, and the related balances.

7 **Q. WHAT METHOD DID YOU USE TO ANALYZE THE SERVICE LIFE**
8 **DATA?**

9 A. I used the retirement rate method for most plant accounts. The retirement rate
10 method can be used when the vintage year of retirement transactions is known or
11 can be estimated. Data in which the vintage year is available is referred to as "aged
12 data." The retirement rate method is the most appropriate method when retirement
13 aged data is available because it determines the rates of retirement experienced by
14 Atmos Energy during the period of time covered by the Depreciation Study.

15 **Q. DID YOU USE THE RETIREMENT RATE METHOD TO ANALYZE**
16 **ATMOS ENERGY'S SERVICE LIFE DATA?**

17 A. Yes. I applied the retirement rate analysis to each different group of property in the
18 Depreciation Study. For each property group, I used the retirement rate data to form
19 life tables which, when plotted, show an original survivor curve for each such
20 property group. Each original survivor curve represents the average survivor
21 pattern experienced by the various vintage groups during the experience band
22 studied. However, the survivor patterns may not necessarily describe the life
23 characteristics of the property group. Therefore, interpretation of the original

1 survivor curves is required in order to use them as valid considerations in estimating
2 service life. The "Iowa-type survivor curves" were used to perform these
3 interpretations.

4 **Q. WHAT ARE "IOWA-TYPE SURVIVOR CURVES" AND HOW DID YOU**
5 **USE SUCH CURVES TO ESTIMATE THE SERVICE LIFE**
6 **CHARACTERISTICS FOR EACH PROPERTY GROUP?**

7 A. Iowa-type survivor curves (Iowa curves) are the industry standard system of
8 survivor curves that contain the range of survivor characteristics usually
9 experienced by utilities and other industrial companies. Such curves were
10 developed at the Iowa State College Engineering Experiment Station through an
11 extensive process of observing and classifying the ages at which various types of
12 property used by utilities and other industrial companies had been retired.

13 Iowa curves are used to smooth and extrapolate original survivor curves
14 determined by the retirement rate method. The Iowa curves and truncated Iowa
15 curves were used in the Depreciation Study to describe the forecasted rates of
16 retirement based on the observed rates of retirement and the outlook for future
17 retirements. The estimated survivor curve designations for each depreciable
18 property group indicate the average service life, the family within the Iowa curve
19 system to which the property group belongs, and the relative height of the mode.
20 For example, the Iowa Curve 50-R2.5 indicates an average service life of 50 years;
21 a right-moded, or R, type curve;³ and a moderate height, 2.5, for the mode.⁴

³ The mode occurs after average life for right-moded curves.

⁴ Possible modes for R type curves range from 0.5 to 5.

1 **Q. HAD THE RETIREMENT RATE METHOD BEEN USED IN ATMOS
2 ENERGY'S PREVIOUS DEPRECIATION STUDIES?**

3 A. No. Aged accounting data since 2005 was available for the study. In previous
4 depreciation studies, semi-actuarial methods were used in part because a limited
5 period of aged data was available. For the current study, because a longer period
6 of aged data is available the retirement rate method is the preferred method.
7 Additionally, in order to have a longer period available for study, vintages were
8 estimated for the available unaged data (for which the vintage year of retirements
9 was unknown) using a statistical aging procedure. This approach has been used in
10 other similar situations for other gas utilities in which aged data was only available
11 for a limited period of time. The use of statistically aged data allows for a more
12 comprehensive period of study that more accurately encompasses the full life cycle
13 of the assets.

14 **Q. DOES THE RETIREMENT RATE METHOD ALLOW FOR THE STUDY
15 OF DIFFERENT TIME PERIODS FOR THE AVAILABLE DATA?**

16 A. Yes. When using the retirement rate method, bands of years can be studied. For
17 example, in the Depreciation Study bands were analyzed that incorporated the full
18 period of available data (aged and statistically aged). Bands were also analyzed
19 that only incorporated aged data.

20 **Q. WERE ANY OTHER ADJUSTMENTS TO THE DATA MADE TO
21 DEVELOP THE DATABASE USED FOR THE DEPRECIATION STUDY?**

22 A. Yes. As part of the process of reviewing the historical data, two aspects of the data
23 were identified in which adjustments were appropriate to develop a database that is

1 more reflective of the experience in the field and future expectations for the
2 Company's assets. First, many assets related to various vintages prior to 1998 had
3 been assigned a vintage year of 1998. For these assets, the vintage year of 1998
4 was statistically aged and assigned to vintages from earlier years up through 1998.
5 For the second set of adjustments, some retirements were identified in which
6 retirements from older vintages were recorded with more recent vintage years.
7 These retirements were also statistically aged and assigned to earlier vintage years.

8 The result of these adjustments is a database in which the ages of assets are
9 more reflective of the Company's experience in the field and the future service life
10 expectations for each affected account. The resultant analysis using the retirement
11 rate method is, therefore, a better reflection of the service life characteristics of each
12 account.

13 **Q. DID YOU PHYSICALLY OBSERVE ATMOS ENERGY'S PLANT AND**
14 **EQUIPMENT AS PART OF YOUR DEPRECIATION STUDY?**

15 A. Yes. In April, 2019, I made a field review of Atmos Energy property as part of the
16 Depreciation Study to observe representative portions of plant. Field reviews are
17 conducted to become familiar with a company's operations and obtain an
18 understanding of the function of the plant and information with respect to the
19 reasons for past retirements and the expected future causes of retirements. Such
20 knowledge, as well as information from other discussions with Atmos Energy's
21 management and operating personnel, was incorporated in the interpretation and
22 extrapolation of the statistical analyses.

1 **Q. HOW DID YOUR EXPERIENCE IN DEVELOPMENT OF OTHER**
2 **DEPRECIATION STUDIES AFFECT YOUR WORK IN THIS CASE FOR**
3 **ATMOS ENERGY?**

4 A. Because my firm, Gannett Fleming, customarily conducts field reviews for
5 depreciation studies, I have had the opportunity to visit many similar facilities and
6 meet with operations personnel at many other companies. The knowledge I have
7 accumulated from those visits and meetings provides me with relevant experience
8 to draw upon to incorporate into the informed judgment used to estimate service
9 lives and net salvage.

10 **Q. PLEASE EXPLAIN THE CONCEPT OF “NET SALVAGE”**

11 A. Net salvage is a component of the service value of capital assets recovered through
12 depreciation rates. The service value of an asset is its original cost less its net
13 salvage. Net salvage is the salvage value received for the asset upon retirement less
14 the cost to retire the asset. When the cost to retire the asset exceeds the salvage
15 value, the result is negative net salvage.

16 Because depreciation expense is the loss in service value of an asset during
17 a defined period (e.g., one year), it must include a ratable portion of both the
18 original cost of the asset and the net salvage. That is, the net salvage related to an
19 asset should be incorporated in the cost of service during the same period as its
20 original cost, so that customers receiving service from the asset pay rates that
21 include a portion of both elements of the asset’s service value, the original cost, and
22 the net salvage value. For example, the full service value of a \$500 regulator may

1 also include \$125 of cost of removal and \$25 gross salvage, for a total service value
2 of \$600 (\$500 + \$125 - \$25).

3 **Q. HOW DID YOU ESTIMATE NET SALVAGE PERCENTAGES?**

4 A. I estimated the net salvage percentages by incorporating Atmos Energy's actual
5 historical data for the period 1992 through 2018 and considered other factors such
6 as the net salvage characteristics of the assets studied and industry experience of
7 net salvage estimates for other gas companies. The net salvage percentages in the
8 Depreciation Study are based on a combination of statistical analyses and informed
9 judgment. The statistical analyses consider the cost of removal and gross salvage
10 ratios to the associated retirements during the 27-year period. Trends of such data
11 are also measured based on three-year moving averages and the most recent five-
12 year indications.

13 **Q. HAVE THERE BEEN ANY ACCOUNTING CHANGES THAT COULD
14 IMPACT NET SALVAGE FOR THE COMPANY'S ASSETS?**

15 A. Yes. Cost of removal for many assets occurs when the assets are replaced with a
16 new asset (or assets). As a result, the costs incurred for many projects include the
17 costs of new assets as well as cost of removal. The Company performed studies of
18 the time involved with each activity on projects and gas mains, gas services and
19 measuring and regulating equipment and for some accounts has updated its process
20 for determining which portion of project costs are recorded as cost of removal. For
21 gas mains and services, these changes were effective in the 2016 fiscal year and for
22 measuring and regulating equipment these changes were effective in the 2017 fiscal
23 year. These accounting changes were considered when estimating net salvage, for

1 example by giving more emphasis to recent data. Additional analyses were
2 performed in which the recorded cost of removal in years prior to 2016 was adjusted
3 to estimate the cost of removal resulting from the updated accounting policies.

4 **Q. PLEASE FURTHER DESCRIBE THE SECOND PHASE OF THE**
5 **PROCESS THAT YOU USED IN THE DEPRECIATION STUDY, IN**
6 **WHICH YOU CALCULATED COMPOSITE REMAINING LIVES AND**
7 **ANNUAL DEPRECIATION ACCRUAL RATES.**

8 A. After I estimated the service life and net salvage characteristics for each depreciable
9 property group, I calculated the annual depreciation accrual rates for each group
10 using the straight line remaining life method, and using remaining lives weighted
11 consistent with the ELG procedure. The calculation of annual depreciation accrual
12 rates were developed as of September 30, 2018.

13 **Q. WHAT IS THE STRAIGHT LINE REMAINING LIFE METHOD OF**
14 **DEPRECIATION?**

15 A. The straight line remaining life method of depreciation allocates the original cost
16 of the property, less accumulated depreciation, less future net salvage, in equal
17 amounts to each year of remaining service life.

18 **Q. WHAT IS THE EQUAL LIFE GROUP PROCEDURE FOR CALCULATING**
19 **REMAINING LIFE ACCRUAL RATES?**

20 A. When using the ELG procedure, a group of property (e.g., a vintage within a
21 property account) is subdivided into groups having equal service lives. The sizes
22 of these “equal life groups” are based on the estimated survivor characteristics of
23 the account. Depreciation is calculated for each equal life group based on the

1 straight-line method and an equal amount of the group's service value is recorded
2 as depreciation expense in each year of service. The total depreciation for an
3 account is the summation of the depreciation calculated for each equal life group.
4 For this reason, the procedure is also known as the "unit summation" procedure.
5 Based on the survivor curve estimate for an account, the ELG procedure
6 mathematically estimates the life for each unit in the account, and then depreciates
7 each unit over its expected life. By calculating depreciation for each equal life
8 group, the ELG procedure contrasts with the Average Service Life ("ASL," also
9 referred to as "Average Life Group," or "ALG") procedure, which depreciates
10 every asset within an account over the average life of the account.

11 The ELG procedure recognizes that a group of assets will experience a
12 dispersion of lives and determines depreciation in a manner in which costs are
13 allocated over the various lives of the assets in the group. In contrast to the ASL
14 procedure, in which costs are allocated over the average life of the group, the ELG
15 provides a better match of costs to the lives of each asset in the depreciable group.

16 **Q. WAS THE EQUAL LIFE GROUP PROCEDURE USED IN THE
17 COMPANY'S PREVIOUS DEPRECIATION STUDY?**

18 A. Yes. The ELG procedure is also used in other Atmos Energy divisions. However,
19 the current depreciation rates for the Kansas Division are the result of a settlement
20 agreement in which the ASL procedure was used.

1 **Q. WHAT IS AMORTIZATION ACCOUNTING, IN CONTRAST TO**
2 **DEPRECIATION ACCOUNTING?**

3 A. Amortization accounting is used for accounts with a large number of units, but
4 relatively small asset values. In amortization accounting, units of property are
5 capitalized in the same manner as they are in depreciation accounting. However,
6 depreciation accounting is difficult for these types of assets because depreciation
7 accounting requires periodic inventories to properly reflect plant in service.
8 Consequently, amortization accounting is used for these types of assets, such that
9 retirements are recorded when a vintage is fully amortized rather than as the units
10 are removed from service. That is, there is no dispersion of retirement in
11 amortization accounting. All units are retired when the age of the vintage reaches
12 the amortization period. Each plant account or group of assets is assigned a fixed
13 period that represents an anticipated life during which the asset will render full
14 benefit. For example, in amortization accounting, assets that have a 15-year
15 amortization period will be fully recovered after 15 years of service and taken off
16 the company's books at that time, although such assets may not necessarily be
17 physically removed from service. In contrast, assets that are physically taken out
18 of service before 15 years remain on the books until the amortization period for that
19 vintage has expired.

20 **Q. IS AMORTIZATION ACCOUNTING BEING UTILIZED FOR CERTAIN**
21 **PLANT ACCOUNTS?**

22 A. Yes. Amortization accounting is being utilized for plant accounts 376.03, 376.04,
23 391.00, 393.00, 394.00, 395.00, 397.00, 397.02, 398.00, 399.01, 399.02, 399.03,

1 399.06, 399.07 and 399.08, which represent less than seven percent of Atmos
2 Energy's depreciable gas plant.

3 **Q. PLEASE PROVIDE AN EXAMPLE TO ILLUSTRATE HOW THE**
4 **ANNUAL DEPRECIATION ACCRUAL RATE FOR A PARTICULAR**
5 **GROUP OF PROPERTY IS PRESENTED IN YOUR DEPRECIATION**
6 **STUDY.**

7 A. A good example is Account 380.00, Services, because it is one of the largest
8 depreciable accounts. The retirement rate method was used to analyze the survivor
9 characteristics of this property group. Aged plant accounting data was compiled
10 from 1926 through 2018 and analyzed in periods that best represent the overall
11 service life of this property. The life tables for the 1926-2018 and 2005-2018
12 experience bands are presented in Part VII of the Depreciation Study on pages VII-
13 82 through VII-85 of the Depreciation Study. The life tables display the retirement
14 and survivor ratios of the aged plant data exposed to retirement by age interval. For
15 example, Part VII, page VII-82 of the Depreciation Study shows \$7,764 retired
16 during the age interval of 0.5 to 1.5, with \$88,100,132 exposed to retirement at the
17 beginning of the age interval (i.e., at age 0.5). Consequently, the retirement ratio is
18 0.0001 and the survivor ratio is 0.9999. The percentage of such assets surviving at
19 age 1.5 is 99.99%, which is equal to the percentage surviving at age 0.5 of 100.00%
20 multiplied by the survivor ratio at age 0.5 of 0.9999. These life tables, or original
21 survivor curves, are plotted along with the estimated smooth survivor curve, the 44-
22 R2 in Part VII on page VII-82 of the Depreciation Study.

1 The net salvage analysis for this account is presented in Part VII on pages
2 VIII-16 and VIII-17 of the Depreciation Study. The net salvage percentages shown
3 on these pages are based on the result of annual gross salvage minus the cost to
4 remove plant assets as compared to the original cost of plant retired during the
5 period 1992 through 2018. This 27-year period experienced negative \$7,034,300
6 (($\$20,065$) - \$7,054,364) in net salvage for \$9,495,345 plant retired. The result is
7 negative net salvage of 74% (\$7,034,300 divided by \$9,495,345). Based on the
8 overall negative 74% net salvage, the most recent 5 years of negative 77%, and in
9 particular the most recent three-year average of negative 39%, as well as general
10 knowledge of the property in this account and Atmos Energy's expectations, I
11 determined that negative 40% is the most appropriate estimate for the account.

12 The calculation of the annual depreciation related to the original cost of gas
13 plant at September 30, 2018 is presented in Part IX on pages IX-29 through IX-31
14 of the Depreciation Study. The calculation is based on the 44-R2 survivor curve,
15 40 percent negative net salvage, the attained age, and the allocated book reserve.
16 The tabulation sets forth the installation year, the original cost, calculated accrued
17 depreciation, allocated book reserve, future accruals, remaining life and annual
18 accrual. These totals are brought forward to the table on Part VI, page VI-4 of the
19 Depreciation Study.

20 **Q. DOES THIS CONCLUDE YOUR DIRECT TESTIMONY?**

21 A. Yes.

VERIFICATION

COMMONWEALTH OF PENNSYLVANIA

§

COUNTY OF CUMBERLAND

§

§

Ned W. Allis, being duly sworn upon his oath, deposes and states that he is Vice President at Gannett Fleming Valuation and Rate Consultants, LLC; that he has read and is familiar with the foregoing Direct Testimony filed herewith; and that the statements made therein are true to the best of his knowledge, information and belief.


Ned W. Allis

Subscribed and sworn before me this 6th day of June, 2019.


Notary Public

My appointment expires: February 20, 2023

Commonwealth of Pennsylvania - Notary Seal
Cheryl Ann Rutter, Notary Public
Cumberland County
My commission expires February 20, 2023
Commission number 1143028
Member, Pennsylvania Association of Notaries

ATMOS ENERGY CORPORATION

KANSAS DIVISION

2018 DEPRECIATION STUDY

CALCULATED ANNUAL DEPRECIATION
ACCRAUALS RELATED TO GAS PLANT
AS OF SEPTEMBER 30, 2018

Prepared by:



Gannett Fleming

*Excellence Delivered **As Promised***

ATMOS ENERGY CORPORATION
KANSAS DIVISION

2018 DEPRECIATION STUDY

CALCULATED ANNUAL DEPRECIATION
ACCRUALS RELATED TO GAS PLANT
AS OF SEPTEMBER 30, 2018

GANNETT FLEMING VALUATION AND RATE CONSULTANTS, LLC
Camp Hill, Pennsylvania



*Excellence Delivered **As Promised***

May 24, 2019

Atmos Energy Corporation
5430 Lyndon B. Johnson Freeway
Dallas, TX 75240

Attention: Joe Christian
Director of Rates & Regulatory Affairs

Ladies and Gentlemen:

Pursuant to your request, we have conducted a depreciation study related to the gas plant of Atmos Energy Corporation - Kansas Division as of September 30, 2018. The attached report presents a description of the methods used in the estimation of depreciation, the summary of annual depreciation accrual rates, the statistical support for the life and net salvage estimates and the detailed tabulations of annual depreciation.

We gratefully acknowledge the assistance of Atmos Energy Corporation personnel in the conduct of this study.

Respectfully submitted,

GANNETT FLEMING VALUATION
AND RATE CONSULTANTS, LLC

A handwritten signature in black ink that reads "Ned W. Allis".

NED W. ALLIS
Vice President

NWA:sh

065117.000

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**ATMOS ENERGY CORPORATION
KANSAS DIVISION**

DEPRECIATION STUDY

EXECUTIVE SUMMARY

Pursuant to Atmos Energy Corporation's ("Atmos") request, Gannett Fleming Valuation and Rate Consultants, LLC ("Gannett Fleming") conducted a depreciation study related to the gas plant of the Kansas Division as of September 30, 2018. The purpose of this study was to determine the annual depreciation accrual rates and amounts for book and ratemaking purposes.

The depreciation rates are based on the straight-line method using the equal life group ("ELG") procedure and were applied on a remaining life basis. The calculations were based on attained ages and estimated survivor curves and forecasted net salvage characteristics for each depreciable group of assets.

The service life and net salvage estimates recommended in the depreciation study are based on informed judgment that incorporates the statistical analyses of historical data through 2018. One change from the previous depreciation study is that sufficient aged data were available for actuarial life analysis, although the available aged data since 2005 were supplemented with unaged data available for earlier years that were statistically aged. In general, the service lives have trended longer for many accounts and the recommended service lives have increased since the last depreciation study. Additionally, the Company has modified its accounting practices for recording cost of removal for replacement projects. This change has been incorporated into the recommended net salvage estimates. In general, the depreciation rates proposed in this study result in a lower level of depreciation expense than the rates recommended in the

previous depreciation study. However, the depreciation rates agreed to in a stipulation agreement were lower than the previous study had recommended. As a result, the depreciation rates proposed in this study, which are based on the same ELG procedure as recommended in the previous depreciation study, result in an overall increase in depreciation expense when compared to the depreciation rates the Company is currently using.

Gannett Fleming recommends the calculated annual depreciation accrual rates set forth herein apply specifically to gas plant in service as of September 30, 2018 as summarized in Table 1 of the study. Supporting analysis and calculations are provided within the study.

The study results set forth an annual depreciation expense of \$13.7 million when applied to depreciable plant balances as of September 30, 2018. The results are summarized at the functional level as follows:

SUMMARY OF ORIGINAL COST, ACCRUAL RATES AND AMOUNTS

FUNCTION	ORIGINAL COST AS OF SEPTEMBER 30, 2018	PROPOSED RATE	PROPOSED EXPENSE
Storage Plant	\$6,460,559.30	2.07	\$133,694
Transmission Plant	1,774,360.81	4.54	80,584
Distribution Plant	349,861,308.09	3.65	12,754,557
General Plant	10,507,192.51	7.26	762,571
Total Depreciable Plant	<u>\$368,603,420.71</u>	3.73	<u>\$13,731,406</u>

PART I. INTRODUCTION

**ATMOS ENERGY CORPORATION
KANSAS DIVISION
DEPRECIATION STUDY**

PART I. INTRODUCTION

SCOPE

This report sets forth the results of the depreciation study for Atmos Energy Corporation's ("Atmos") Kansas Division, to determine the annual depreciation accrual rates and amounts for book purposes applicable to the original cost of gas plant as of September 30, 2018. The rates and amounts are based on the straight-line remaining life method of depreciation. This report also describes the concepts, methods and judgments which underlie the recommended annual depreciation accrual rates related to gas plant in service as of September 30, 2018.

The service life and net salvage estimates resulting from the study were based on informed judgment which incorporated analyses of historical plant retirement data as recorded through 2018, a review of Company practice and outlook as they relate to plant operation and retirement, and consideration of current practice in the gas industry, including knowledge of service lives and net salvage estimates used for other gas companies.

PLAN OF REPORT

Part I, Introduction, describes the plan of the report and the basis of the study. Part II, Estimation of Survivor Curves, provides descriptions of the considerations and the methods used in the service life and net salvage analyses. Part III, Service Life Considerations, presents the factors and judgment utilized in the average service life analysis. Part IV, Net Salvage Considerations, discusses the judgment utilized in the net salvage study. Part V, Calculation of Annual and Accrued Depreciation, describes the procedures used in the calculation of group depreciation. Part VI, Results of Study,

presents summaries by depreciable group of annual depreciation accrual rates and amounts, as well as composite remaining lives. Part VII, Service Life Statistics, provides the statistical analysis of service life estimates; Part VIII, Net Salvage Statistics, sets forth the statistical indications of net salvage percents; and Part IX, Detailed Depreciation Calculations, presents the detailed tabulations of annual depreciation.

BASIS OF THE STUDY

Depreciation

Depreciation, in public utility regulation, is the loss in service value not restored by current maintenance and which is incurred in through the consumption or prospective retirement of utility plant in the course of service from causes which are known to be in current operation and against which the utility is not protected by insurance. Among causes to be given consideration are wear and tear, deterioration, action of the elements, inadequacy, obsolescence, changes in the art, changes in demand, and the requirements of public authorities.

For accounting purposes, depreciation is a method of distributing fixed capital costs, less net salvage, over a period of time by allocating annual amounts to expense. Each annual amount of such depreciation expense is part of that year's total cost of providing utility service. Normally, the period of time over which the fixed capital cost is allocated to the cost of service is equal to the period of time over which an item renders service, that is, the item's service life. The most prevalent method of allocation is distribution of an equal amount of cost to each year of service life. This method is known as the straight-line method of depreciation.

The annual depreciation for most accounts was calculated by the straight-line method using the equal life group (ELG) procedure and the remaining life basis. For certain General Plant accounts, the annual depreciation is based on amortization

accounting. Both types of calculations were based on original cost, attained ages, and estimates of service lives and net salvage.

The straight-line method, ELG procedure is a commonly used depreciation calculation procedure that has been accepted in many jurisdictions throughout the country. ELG is the same procedure recommended in the Company's previous depreciation study. Amortization accounting is used for certain General Plant accounts because the accounting required would otherwise be significant for a collection of assets that are a small portion of the total plant in service. An explanation of the calculation of annual and accrued amortization is presented beginning on page V-8 of the report.

Service Life and Net Salvage Estimates

The service life and net salvage estimates used in the depreciation and amortization calculations were based on informed judgment which incorporated a review of management's plans, policies and outlook, a general knowledge of the gas utility industry, and comparisons of the service life and net salvage estimates from our studies of other gas utilities. The use of survivor curves to reflect the expected dispersion of retirement provides a consistent method of estimating depreciation for gas plant. Iowa type survivor curves were used to model the estimated survivor curves for the plant accounts not subject to amortization accounting.

The procedure for estimating service lives consisted of compiling historical data for the plant accounts or depreciable groups, analyzing this history through the use of widely accepted techniques, and forecasting the survivor characteristics for each depreciable group based on interpretations of the historical data analyses and the probable future. The combination of the historical experience and the estimated future yielded estimated survivor curves from which the average service lives were derived.

**PART II. ESTIMATION OF
SURVIVOR CURVES**

PART II. ESTIMATION OF SURVIVOR CURVES

The calculation of annual depreciation based on the straight-line method requires the estimation of survivor curves and the selection of group depreciation procedures. The estimation of survivor curves is discussed below, and the development of net salvage estimates is discussed in later sections of this report.

SURVIVOR CURVES

The use of an average service life for a property group implies that the various units in the group have different lives. Thus, the average life may be obtained by determining the separate lives of each of the units or by constructing a survivor curve by plotting the number of units which survive at successive ages.

The survivor curve graphically depicts the amount of property existing at each age throughout the life of an original group. From the survivor curve, the average life of the group, the remaining life expectancy, the probable life, and the frequency curve can be calculated. In Figure 1, a typical smooth survivor curve and the derived curves are illustrated. The average life is obtained by calculating the area under the survivor curve, from age zero to the maximum age and dividing this area by the ordinate at age zero. The remaining life expectancy at any age can be calculated by obtaining the area under the curve, from the observation age to the maximum age, and dividing this area by the percent surviving at the observation age. For example, in Figure 1, the remaining life at age 30 is equal to the cross-hatched area under the survivor curve divided by 29.5 percent surviving at age 30. The probable life at any age is developed by adding the age and remaining life. If the probable life of the property is calculated for each year of age, the probable life curve shown in the chart can be developed. The frequency curve presents the number of units retired in each age interval. It is derived by obtaining the differences between the amount of property surviving at the beginning and at the end of each interval.

This study has incorporated the use of Iowa curves developed from a retirement rate analysis of historical retirement history. A discussion of the concepts of survivor curves and of the development of survivor curves using the retirement rate method is presented below.

Iowa Type Curves

The range of survivor characteristics usually experienced by utility and industrial properties is encompassed by a system of generalized survivor curves known as the Iowa type curves. There are four families in the Iowa system, labeled in accordance with the location of the modes of the retirements in relationship to the average life and the relative height of the modes. The left moded curves, presented in Figure 2, are those in which the greatest frequency of retirement occurs to the left of, or prior to, average service life. The symmetrical moded curves, presented in Figure 3, are those in which the greatest frequency of retirement occurs at average service life. The right moded curves, presented in Figure 4, are those in which the greatest frequency occurs to the right of, or after, average service life. The origin moded curves, presented in Figure 5, are those in which the greatest frequency of retirement occurs at the origin, or immediately after age zero. The letter designation of each family of curves (L, S, R or O) represents the location of the mode of the associated frequency curve with respect to the average service life. The numbers represent the relative heights of the modes of the frequency curves within each family.

The Iowa curves were developed at the Iowa State College Engineering Experiment Station through an extensive process of observation and classification of the ages at which industrial property had been retired. A report of the study which resulted in the classification of property survivor characteristics into 18 type curves, which

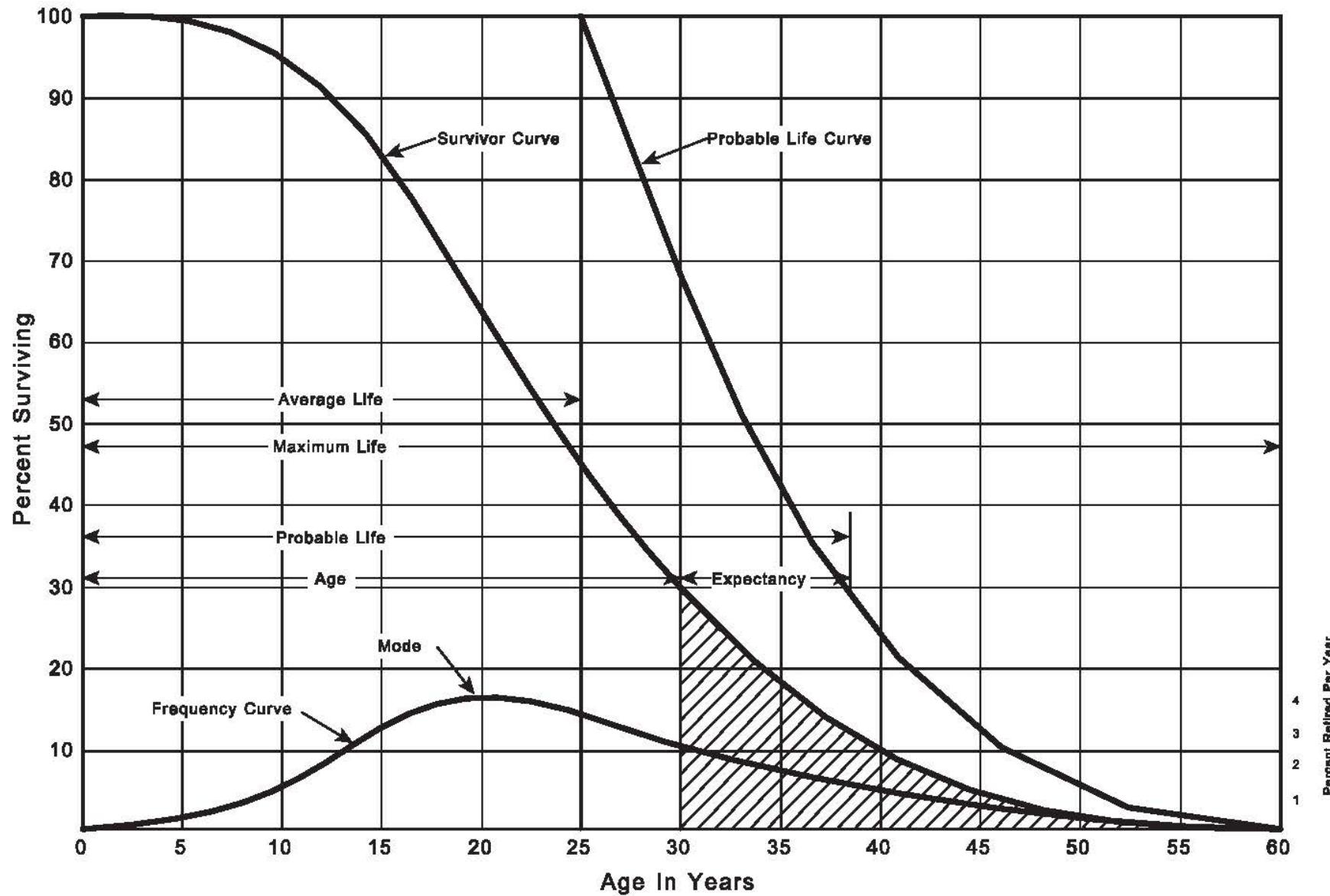


Figure 1. A Typical Survivor Curve and Derived Curves

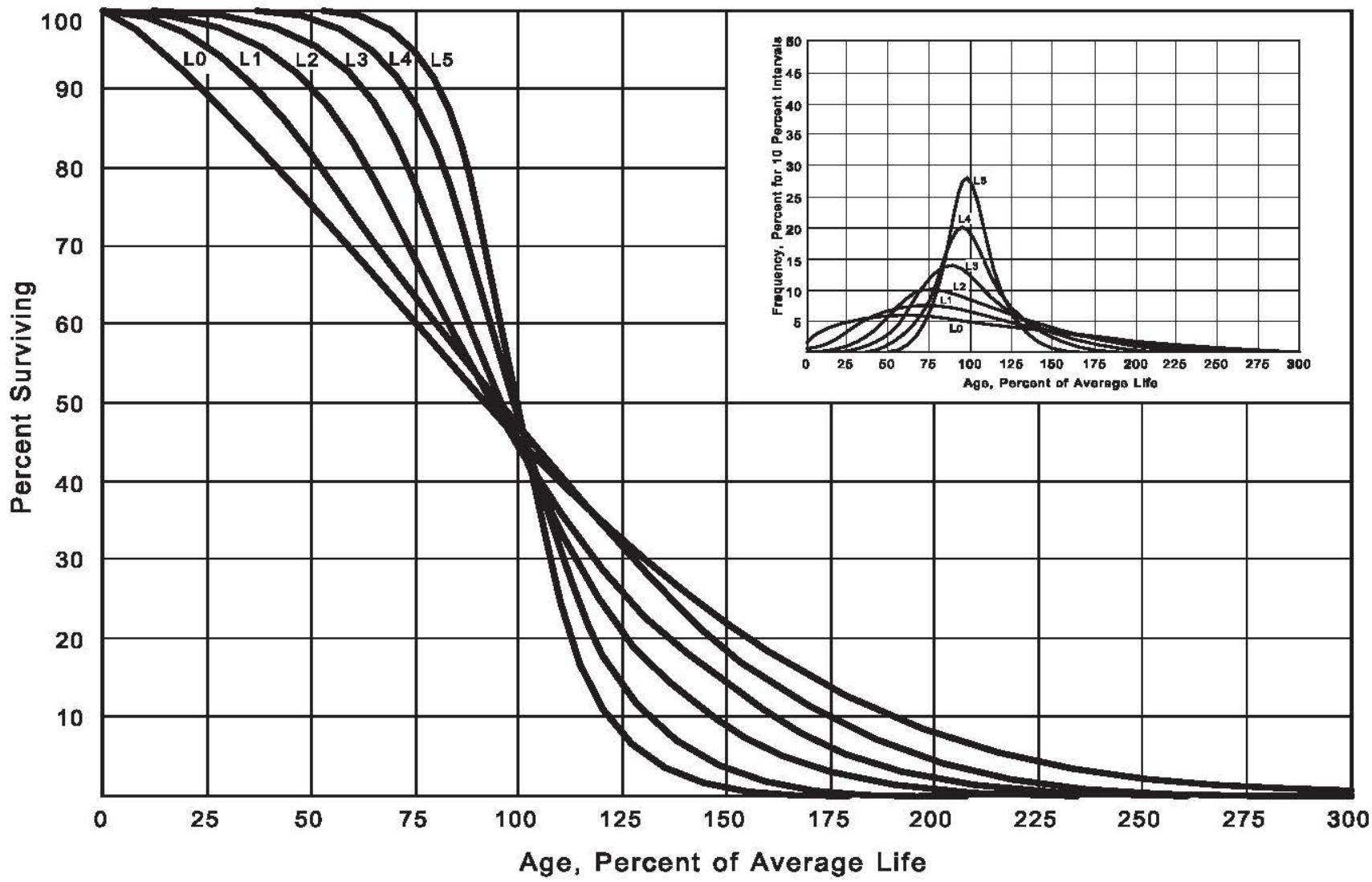


Figure 2. Left Modal or "L" Iowa Type Survivor Curves

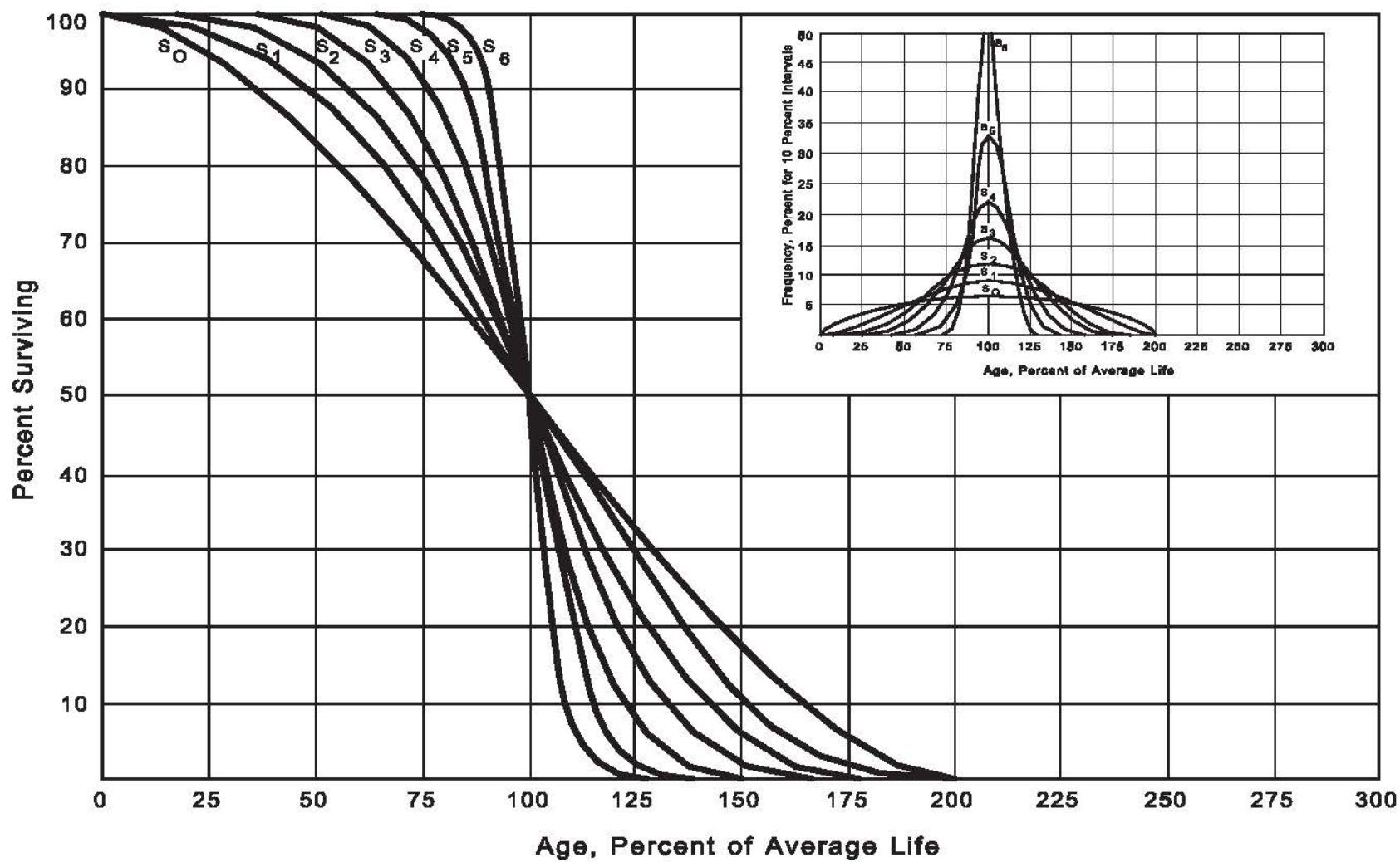


Figure 3. Symmetrical or "S" Iowa Type Survivor Curves

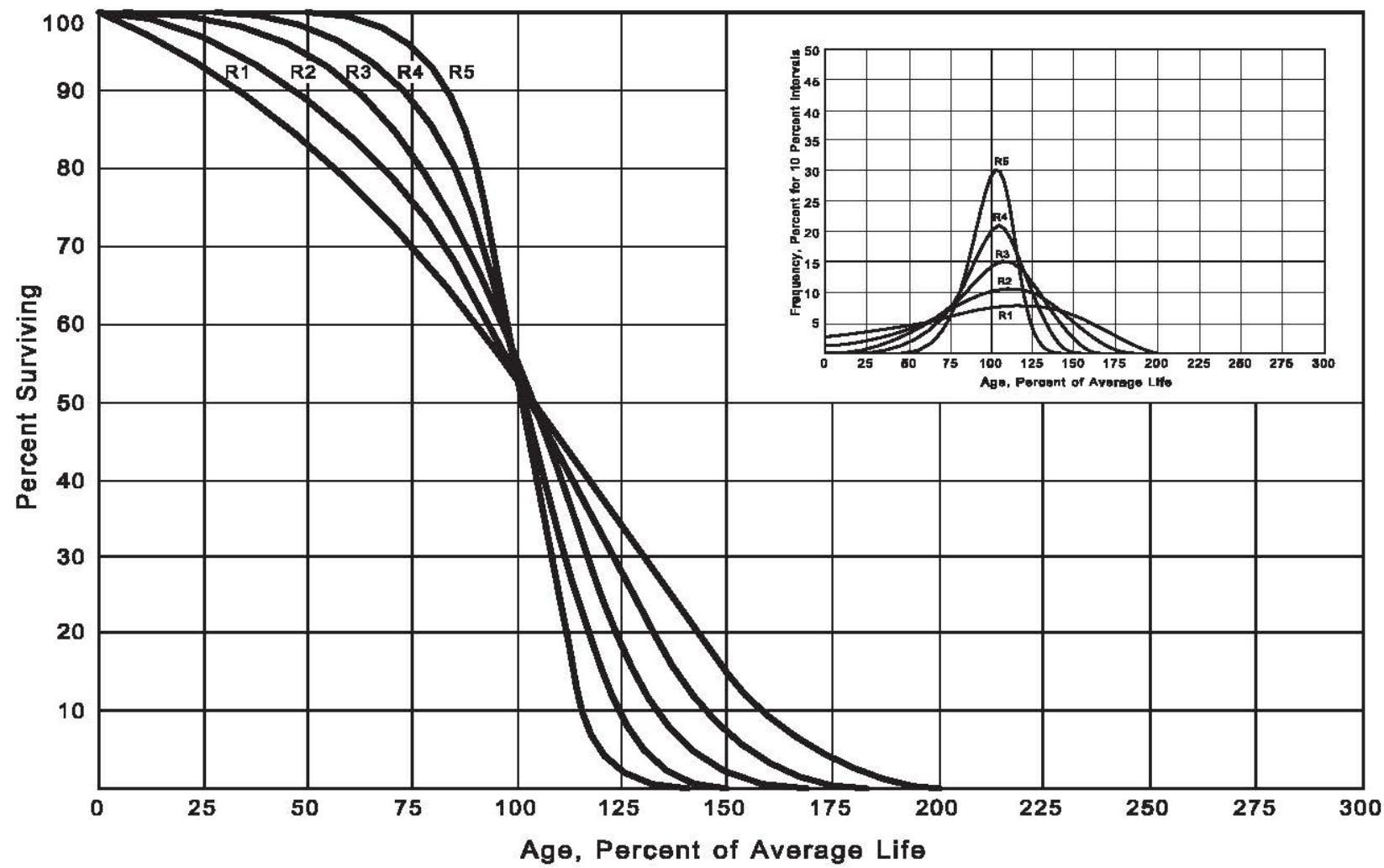


Figure 4. Right Modal or "R" Iowa Type Survivor Curves

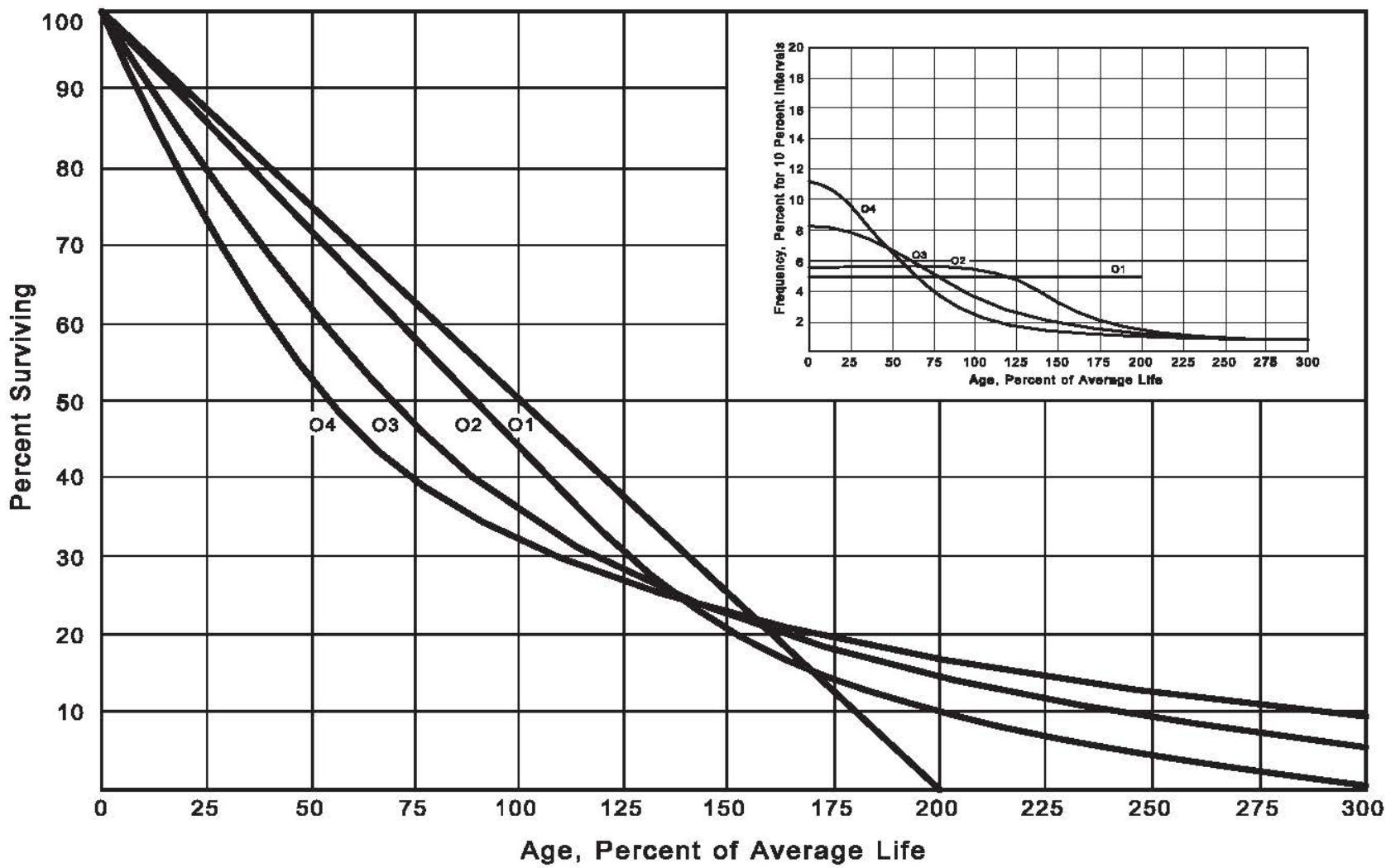


Figure 5. Origin Modal or "O" Iowa Type Survivor Curves

constitute three of the four families, was published in 1935 in the form of the Experiment Station's Bulletin 125. These curve types have also been presented in subsequent Experiment Station bulletins and in the text, Engineering Valuation and Depreciation.¹ In 1957, Frank V. B. Couch, Jr., an Iowa State College graduate student, submitted a thesis presenting his development of the fourth family consisting of the four O type survivor curves.

Retirement Rate Method of Analysis

The retirement rate method is an actuarial method of deriving survivor curves using the average rates at which property of each age group is retired. The method relates to property groups for which aged accounting experience is available and is the method used to develop the original stub survivor curves in this study. The method (also known as the annual rate method) is illustrated through the use of an example in the following paragraphs and is also explained in several publications, including Statistical Analyses of Industrial Property Retirements,² Engineering Valuation and Depreciation,³ and Depreciation Systems.⁴

The average rate of retirement used in the calculation of the percent surviving for the survivor curve (life table) requires two sets of data: first, the property retired during a period of observation, identified by the property's age at retirement; and second, the property exposed to retirement at the beginning of the age intervals during the same period. The period of observation is referred to as the experience band, and the band of years which represent the installation dates of the property exposed to retirement during the experience band is referred to as the placement band. An example of the calculations used in the development of a life table follows. The example includes schedules of annual aged property transactions, a schedule of plant exposed to retirement, a life table and illustrations of smoothing the stub survivor curve.

¹Marston, Anson, Robley Winfrey and Jean C. Hempstead. Engineering Valuation and Depreciation, 2nd Edition. New York, McGraw-Hill Book Company. 1953.

² Winfrey, Robley, Statistical Analyses of Industrial Property Retirements. Iowa State College Engineering Experiment Station, Bulletin 125. 1935

³Marston, Anson, Robley Winfrey, and Jean C. Hempstead, Supra Note 1.

⁴Wolf, Frank K. and W. Chester Fitch. Depreciation Systems. Iowa State University Press. 1994.

Schedules of Annual Transactions in Plant Records

The property group used to illustrate the retirement rate method is observed for the experience band 2009-2018 during which there were placements in the years 2004-2018. In order to illustrate the summation of the aged data by age interval, the data were compiled in the manner presented in Schedules 1 and 2 on pages II-11 and II-12. In Schedule 1, the year of installation (year placed) and the year of retirement are shown. The age interval during which a retirement occurred is determined from this information. In the example, \$10,000 of the dollars invested in 2004 were retired in 2009. The \$10,000 retirement occurred during the age interval between 4½ and 5½ years on the basis that approximately one-half of the amount of property was installed prior to and subsequent to July 1 of each year. That is, on average, property installed during a year is placed in service at the midpoint of the year for the purpose of the analysis. All retirements also are stated as occurring at the midpoint of a one-year age interval of time, except the first age interval which encompasses only one-half year.

The total retirements occurring in each age interval in a band are determined by summing the amounts for each transaction year-installation year combination for that age interval. For example, the total of \$143,000 retired for age interval 4½-5½ is the sum of the retirements entered on Schedule 1 immediately above the stair step line drawn on the table beginning with the 2009 retirements of 2004 installations and ending with the 2018 retirements of the 2013 installations. Thus, the total amount of 143 for age interval 4½-5½ equals the sum of:

$$10 + 12 + 13 + 11 + 13 + 13 + 15 + 17 + 19 + 20.$$

**SCHEDULE 1. RETIREMENTS FOR EACH YEAR 2009-2018
SUMMARIZED BY AGE INTERVAL**

Experience Band 2009-2018

Placement Band 2004-2018

Placed (1)	Year 2009 (2)	Retirements, Thousands of Dollars						Total During Age Interval (12)	Age Interval (13)		
		2010 (3)	2011 (4)	2012 (5)	2013 (6)	2014 (7)	2015 (8)	2016 (9)	2017 (10)	2018 (11)	
2004	10	11	12	13	14	16	23	24	25	26	13½-14½
2005	11	12	13	15	16	18	20	21	22	19	12½-13½
2006	11	12	13	14	16	17	19	21	22	18	11½-12½
2007	8	9	10	11	11	13	14	15	16	17	10½-11½
2008	9	10	11	12	13	14	16	17	19	20	9½-10½
2009	4	9	10	11	12	13	14	15	16	20	8½-9½
2010	5	11	12	13	14	15	15	16	18	20	7½-8½
2011	6	12	13	15	16	17	17	19	19	19	6½-7½
2012	6	13	15	16	17	17	19	19	19	19	5½-6½
2013	7	14	14	16	17	17	19	19	20	20	143
2014	8	18	20	20	20	19	19	22	23	146	3½-4½
2015											4½-5½
2016											1½-2½
2017											½-1½
2018											0-½
Total	<u>53</u>	<u>68</u>	<u>86</u>	<u>106</u>	<u>128</u>	<u>157</u>	<u>196</u>	<u>231</u>	<u>273</u>	<u>308</u>	<u>1,606</u>

**SCHEDULE 2. OTHER TRANSACTIONS FOR EACH YEAR 2009-2018
SUMMARIZED BY AGE INTERVAL**

Experience Band 2009-2018

Placement Band 2004-2018

Year Placed (1)	Acquisitions, Transfers and Sales, Thousands of Dollars							Placement Band 2004-2018 (13)
	2009 (2)	2010 (3)	2011 (4)	2012 (5)	2013 (6)	2014 (7)	2015 (8)	
2004	-	-	-	-	-	60 ^a	-	-
2005	-	-	-	-	-	-	-	-
2006	-	-	-	-	-	-	-	-
2007	-	-	-	-	-	-	(5) ^b	-
2008	-	-	-	-	-	-	6 ^a	-
2009	-	-	-	-	-	-	-	(5)
2010	-	-	-	-	-	-	-	6
2011	-	-	-	-	-	-	-	-
2012	-	-	-	-	-	(12) ^b	-	-
2013	-	-	-	-	-	-	22 ^a	-
2014	-	-	-	-	-	(19) ^b	-	-
2015	-	-	-	-	-	-	-	10
2016	-	-	-	-	-	-	-	3 ^{1/2} -4 ^{1/2}
2017	-	-	-	-	-	-	-	2 ^{1/2} -3 ^{1/2}
2018	-	-	-	-	-	-	-	1 ^{1/2} -2 ^{1/2}
Total	-	-	-	-	-	-	60	1 ^{1/2} -1 ^{1/2}
							(30)	0-1 ^{1/2}
							22	0-1 ^{1/2}
							(102)	0-1 ^{1/2}
							(102)	0-1 ^{1/2}
							(50)	0-1 ^{1/2}

^a Transfer Affecting Exposures at Beginning of Year

^b Transfer Affecting Exposures at End of Year

^c Sale with Continued Use
Parentheses Denote Credit Amount.

In Schedule 2, other transactions which affect the group are recorded in a similar manner. The entries illustrated include transfers and sales. The entries which are credits to the plant account are shown in parentheses. The items recorded on this schedule are not totaled with the retirements but are used in developing the exposures at the beginning of each age interval.

Schedule of Plant Exposed to Retirement

The development of the amount of plant exposed to retirement at the beginning of each age interval is illustrated in Schedule 3 on page II-14. The surviving plant at the beginning of each year from 2009 through 2018 is recorded by year in the portion of the table headed "Annual Survivors at the Beginning of the Year." The last amount entered in each column is the amount of new plant added to the group during the year. The amounts entered in Schedule 3 for each successive year following the beginning balance or addition are obtained by adding or subtracting the net entries shown on Schedules 1 and 2. For the purpose of determining the plant exposed to retirement, transfers in are considered exposed to retirement in this group at the beginning of the year in which they occurred, and the sales and transfers out are assumed to be removed from the plant exposed to retirement at the beginning of the following year. Thus, the amounts of plant shown at the beginning of each year are the amounts of plant from each placement year considered to be exposed to retirement at the beginning of each successive transaction year. For example, the exposures for the installation year 2014 are calculated in the following manner:

Exposures at age 0	= amount of addition	= \$750,000
Exposures at age ½	= \$750,000 - \$8,000	= \$742,000
Exposures at age 1½	= \$742,000 - \$18,000	= \$724,000
Exposures at age 2½	= \$724,000 - \$20,000 - \$19,000	= \$685,000
Exposures at age 3½	= \$685,000 - \$22,000	= \$663,000.

**SCHEDULE 3. PLANT EXPOSED TO RETIREMENT
JANUARY 1 OF EACH YEAR 2009-2018
SUMMARIZED BY AGE INTERVAL**

Experience Band 2009-2018

Placement Band 2004-2018

Year Placed	Exposures, Thousands of Dollars										Total at Beginning of Age Interval	Age Interval	
	2009	2010	2011	2012	Annual Survivors at the Beginning of the Year	2013	2014	2015	2016	2017	2018		
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)	(11)	(12)	(13)	
2004	255	245	234	222	209	195	239	216	192	167	167	13½-14½	
2005	279	268	256	243	228	212	194	174	153	131	323	12½-13½	
2006	307	296	284	271	257	241	224	205	184	162	531	11½-12½	
2007	338	330	321	311	300	289	276	262	242	226	823	10½-11½	
2008	376	367	357	346	334	321	307	297	280	261	1,097	9½-10½	
2009	420 ^a	416	407	397	386	374	361	347	332	316	1,503	8½-9½	
2010	460 ^a	455	444	432	419	405	390	374	356	356	1,952	7½-8½	
2011	510 ^a	504	492	479	464	448	431	412	412	412	2,463	6½-7½	
2012		580 ^a	574	561	546	530	501	482	482	482	3,057	5½-6½	
2013			660 ^a	653	639	623	628	609	609	609	3,789	4½-5½	
2014				750 ^a	742	724	685	663	663	663	4,332	3½-4½	
2015					850 ^a	841	821	799	799	799	4,955	2½-3½	
2016						960 ^a	949	926	926	926	5,719	1½-2½	
2017							1,080 ^a	1,069	1,069	1,069	6,579	½-1½	
2018								1,220 ^a	1,220 ^a	1,220 ^a	7,490	0-½	
Total	1,975	2,382	2,824	3,318	3,872	4,494	5,247	6,017	6,852	7,799	44,780		

^aAdditions during the year

For the entire experience band 2009-2018, the total exposures at the beginning of an age interval are obtained by summing diagonally in a manner similar to the summing of the retirements during an age interval (Schedule 1). For example, the amount of 3,789, shown as the total exposures at the beginning of age interval 4½-5½, is obtained by summing:

$$255 + 268 + 284 + 311 + 334 + 374 + 405 + 448 + 501 + 609.$$

Original Life Table

The original life table presented in Schedule 4, on page II-16, is developed from the totals shown on the schedules of retirements and exposures (Schedules 1 and 3, respectively). The exposures at the beginning of the age interval are obtained from the corresponding age interval of the exposure schedule, and the retirements during the age interval are obtained from the corresponding age interval of the retirement schedule. The retirement ratio is the result of dividing the retirements during the age interval by the exposures at the beginning of the age interval. The percent surviving at the beginning of each age interval is derived from survivor ratios, each of which equals one minus the retirement ratio. The percent surviving is developed by starting with 100% at age zero and successively multiplying the percent surviving at the beginning of each interval by the survivor ratio, that is, one minus the retirement ratio for that age interval. The calculations to determine the percent surviving at age 5½ are as follows:

Percent surviving at age 4½	=	88.15
Exposures at age 4½	=	3,789,000
Retirements from age 4½ to 5½	=	143,000
Retirement Ratio	=	$143,000 \div 3,789,000 = 0.0377$
Survivor Ratio	=	$1.000 - 0.0377 = 0.9623$
Percent surviving at age 5½	=	$(88.15) \times (0.9623) = 84.83$

The totals of the exposures and retirements (columns 2 and 3) are shown for the purpose of checking with the respective totals in Schedules 1 and 3. Totals are not shown in the retirement and survivor ratios columns, since these have significance only at the individual age intervals.

**SCHEDULE 4. ORIGINAL LIFE TABLE
CALCULATED BY THE RETIREMENT RATE METHOD**

Experience Band 2009-2018

Placement Band 2004-2018

(Exposure and Retirement Amounts are in Thousands of Dollars)

Age at Beginning of Interval	Exposures at Beginning of Age Interval	Retirements During Age Interval	Retirement Ratio	Survivor Ratio	Percent Surviving at Beginning of Age Interval
(1)	(2)	(3)	(4)	(5)	(6)
0.0	7,490	80	0.0107	0.9893	100.00
0.5	6,579	153	0.0233	0.9767	98.93
1.5	5,719	151	0.0264	0.9736	96.62
2.5	4,955	150	0.0303	0.9697	94.07
3.5	4,332	146	0.0337	0.9663	91.22
4.5	3,789	143	0.0377	0.9623	88.15
5.5	3,057	131	0.0429	0.9571	84.83
6.5	2,463	124	0.0503	0.9497	81.19
7.5	1,952	113	0.0579	0.9421	77.11
8.5	1,503	105	0.0699	0.9301	72.65
9.5	1,097	93	0.0848	0.9152	67.57
10.5	823	83	0.1009	0.8991	61.84
11.5	531	64	0.1205	0.8795	55.60
12.5	323	44	0.1362	0.8638	48.90
13.5	<u>167</u>	<u>26</u>	0.1557	0.8443	42.24
					35.66
Total	<u>44,780</u>	<u>1,606</u>			

Column 2 from Schedule 3, Column 12, Plant Exposed to Retirement.

Column 3 from Schedule 1, Column 12, Retirements for Each Year.

Column 4 = Column 3 Divided by Column 2.

Column 5 = 1.0000 Minus Column 4.

Column 6 = Column 5 Multiplied by Column 6 as of the Preceding Age Interval.

The original survivor curve is plotted from the original life table (column 6, Schedule 4). When the curve terminates at a percent surviving greater than zero, it is called a stub survivor curve. Survivor curves developed from retirement rate studies generally are stub curves.

Smoothing the Original Survivor Curve

The smoothing of the original survivor curve eliminates any irregularities and serves as the basis for the preliminary extrapolation to zero percent surviving of the original stub curve. Even if the original survivor curve is complete from 100% to zero percent, it is desirable to eliminate any irregularities, as there is still an extrapolation for the vintages which have not yet lived to the age at which the curve reaches zero percent. In this study, the smoothing of the original curve with established type curves was used to eliminate irregularities in the original curve.

The Iowa type curves are used in this study to smooth those original stub curves which are expressed as percent surviving at ages (in years). Each original survivor curve was compared to the Iowa curves using visual and mathematical matching in order to determine the better fitting smooth curves. In Figures 6, 7, and 8, the original curve developed in Table 4 is compared with the L, S, and R Iowa type curves which most nearly fit the original survivor curve. In Figure 6, the L1 curve with an average life between 12 and 13 years appears to be the best fit. In Figure 7, the S0 type curve with a 12-year average life appears to be the best fit and appears to be better than the L1 fitting. In Figure 8, the R1 type curve with a 12-year average life appears to be the best fit and appears to be better than either the L1 or the S0.

In Figure 9, the three fittings, 12-L1, 12-S0 and 12-R1 are drawn for comparison purposes. It is probable that the 12-R1 Iowa curve would be selected as the most representative of the plotted survivor characteristics of the group.

FIGURE 6. ILLUSTRATION OF THE MATCHING OF AN ORIGINAL SURVIVOR CURVE WITH AN L1 IOWA TYPE CURVE
ORIGINAL AND SMOOTH SURVIVOR CURVES

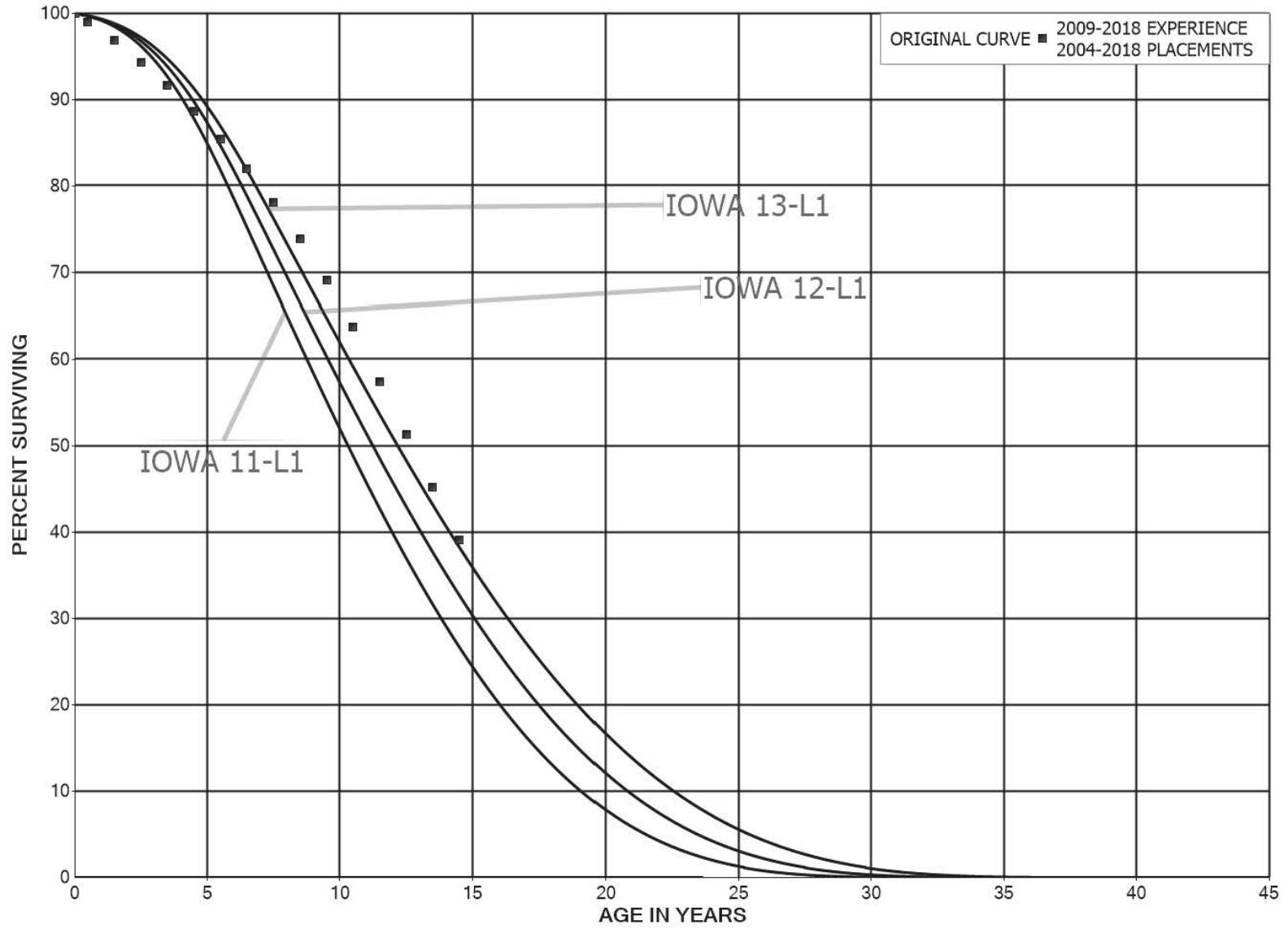


FIGURE 7. ILLUSTRATION OF THE MATCHING OF AN ORIGINAL SURVIVOR CURVE WITH AN S0 IOWA TYPE CURVE
ORIGINAL AND SMOOTH SURVIVOR CURVES

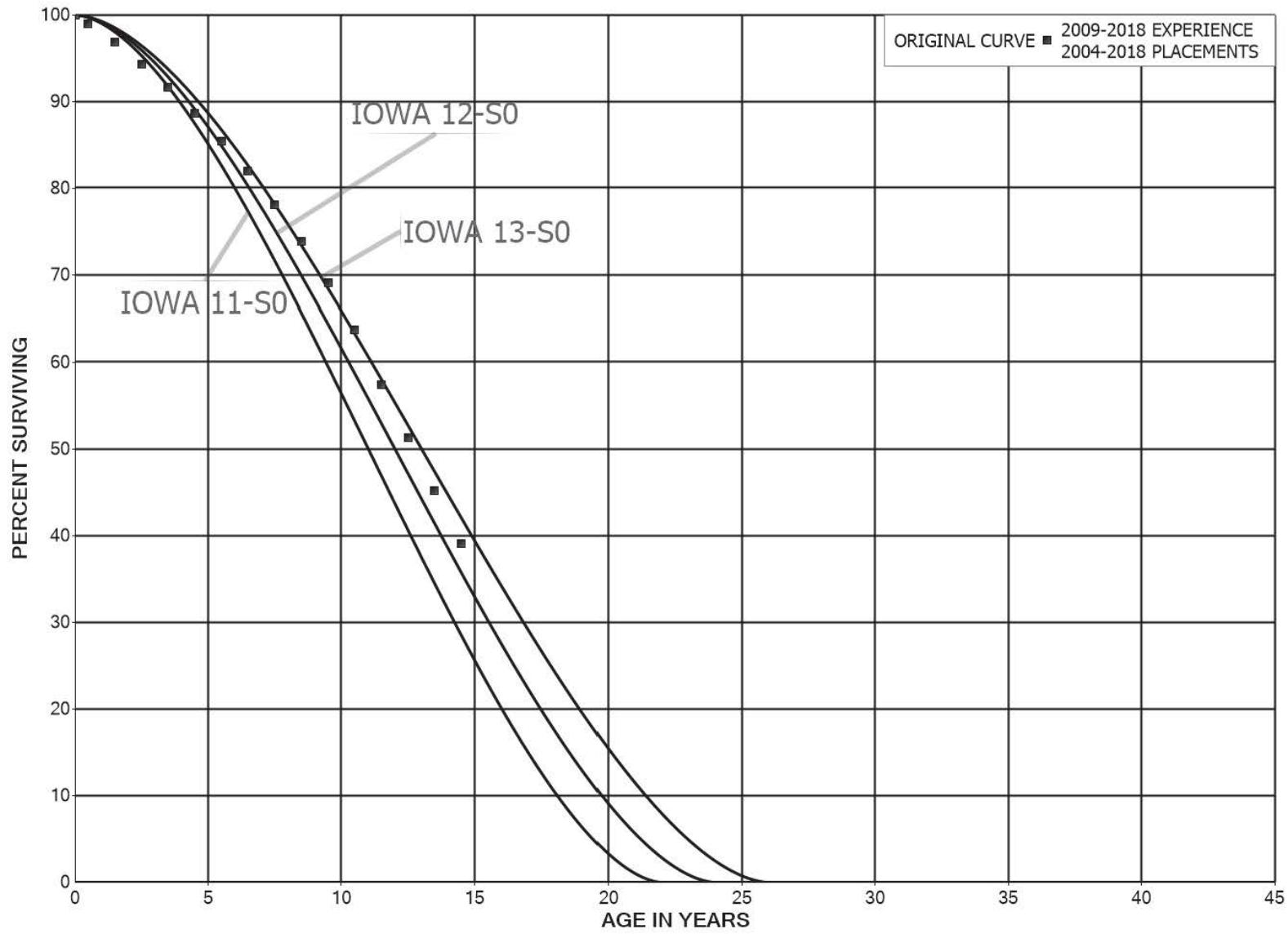


FIGURE 8. ILLUSTRATION OF THE MATCHING OF AN ORIGINAL SURVIVOR CURVE WITH AN R1 IOWA TYPE CURVE
ORIGINAL AND SMOOTH SURVIVOR CURVES

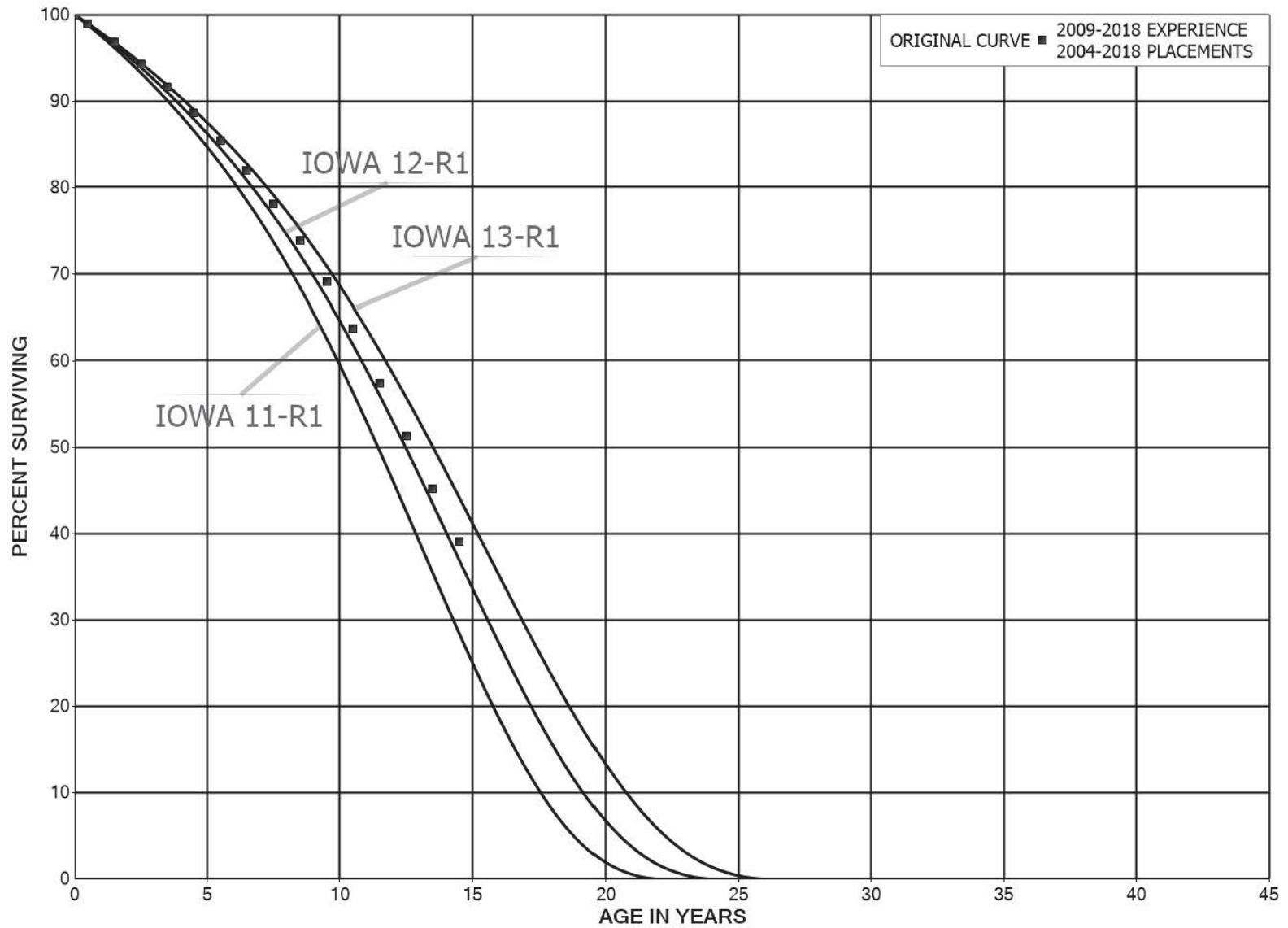
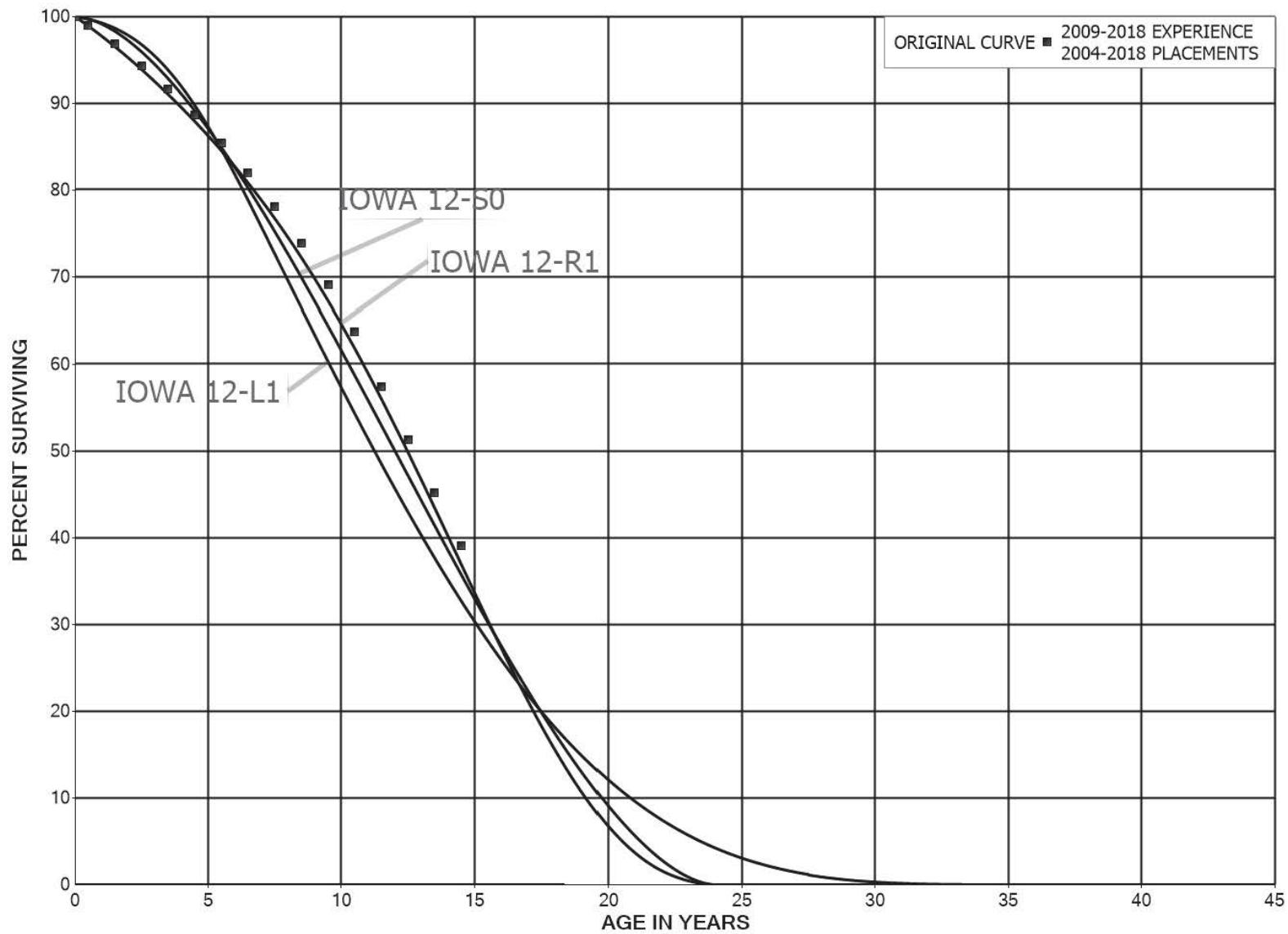


FIGURE 9. ILLUSTRATION OF THE MATCHING OF AN ORIGINAL SURVIVOR CURVE WITH AN L1, S0 AND R1 IOWA TYPE CURVE
ORIGINAL AND SMOOTH SURVIVOR CURVES



PART III. SERVICE LIFE CONSIDERATIONS

PART III. SERVICE LIFE CONSIDERATIONS

FIELD TRIPS

In order to be familiar with the operation of the Company and observe representative portions of the plant, a field trip was conducted for the study. A general understanding of the function of the plant and information with respect to the reasons for past retirements and the expected future causes of retirements are obtained during field trips. This knowledge and information were incorporated in the interpretation and extrapolation of the statistical analyses.

The following is a list of the locations visited during the field trip.

April 3 and 4, 2019

Olathe Office

North Town Border Station

South Glavin Town Border Station

SERVICE LIFE ANALYSIS

The service life estimates were based on informed judgment which considered various factors. The primary factors were the statistical analyses of data; current Company policies and outlook as determined during conversations with management; and the survivor curve estimates from previous studies of this company and other gas companies.

For many of the plant accounts and subaccounts for which survivor curves were estimated, the statistical analyses using the retirement rate method contributed significantly towards the recommended survivor curves. These accounts represent 92 percent of depreciable plant. The statistical support for the service life estimates is presented in the section beginning on page VII-2.

<u>Account No.</u>	<u>Account Description</u>
STORAGE PLANT	
352.00	Wells
353.00	Pipelines
354.00	Compressor Station Equipment
355.00	Measuring and Regulating Equipment

TRANSMISSION PLANT	
367.00	Mains – Cathodic Protection
367.01	Mains – Steel
369.00	Measuring and Regulating Station Equipment

DISTRIBUTION PLANT	
375.00	Structures and Improvements
376.00	Mains – Cathodic Protection
376.01	Mains – Steel
376.02	Mains – Plastic
378.00	Measuring and Regulating Station Equipment
380.00	Services
381.00	Meters
382.00	Meter Installations
383.00	House Regulators
384.00	House Regulator Installations
385.00	Industrial Measuring and Regulating Equipment
387.00	Other Equipment

GENERAL PLANT	
390.00	Structures and Improvements
392.00	Transportation Equipment
396.00	Power Operated Equipment

Account 376, Mains, is the largest plant account and is used to illustrate the manner in which the study was conducted for the accounts in the preceding list. Aged plant accounting data is available from 2005 through 2018. These data have been coded according to account or property group, type of transaction, year in which the transaction took place and year in which the utility plant was placed in service. For years prior to 2005, unaged data were available. The unaged data were statistically aged and combined with the available aged data to develop the overall database used for the study. The retirements, other plant transactions and plant additions were analyzed by the

retirement rate method. Bands were used to analyze both periods that included the statistically aged data and periods that excluded the statistically aged data. Accounts 376.00 Mains – Cathodic Protection, 376.01 Mains – Steel, and 376.02 Mains – Plastic were studied together. The current survivor curve estimate for these accounts is the 50-R1.5. The statistical analysis through 2018 indicates a longer service life than the current estimate. However, the Company also has a replacement program that will affect a significant portion of mains in the coming years. As a result, it is expected that retirements will increase going forward. While the historical data indicate a longer service life for this account, a relatively gradual increase in service life is recommended. The proposed 55-R2 survivor curve is based on the statistical indication for the periods 1926 through 2018 and 2005 through 2018. The 55-R2 is a reasonable fit of the significant portion of the original survivor curve as set forth on page VII-64, is consistent with the considerations discussed above and with management outlook for the account, and is within the typical industry range of average service lives of 55 to 75 years for mains.

Assets in Account 376.03, Mains – Anodes, and Account 376.04, Mains – Leak Clamps, are expected to have service lives shorter than those in the other Mains accounts and are relatively small dollar assets. The recommendation for these accounts is to use amortization accounting, consistent with the approach currently used for many general plant accounts. Amortization accounting is discussed further in Part V of this report.

Generally, the survivor curve estimates for the remaining accounts were based on judgments which considered the statistical analyses, the nature of the plant and equipment, the previous estimate for the Company and a general knowledge of service lives for similar equipment in other gas companies.

PART IV. NET SALVAGE CONSIDERATIONS

PART IV. NET SALVAGE CONSIDERATIONS

NET SALVAGE ANALYSIS

The estimates of net salvage by account were based in part on historical data compiled for the years 1992 through 2018. Cost of removal and salvage were expressed as percents of the original cost of plant retired, both on annual and three-year moving average bases. The most recent five-year average also was calculated for consideration. The net salvage estimates by account are expressed as a percent of the original cost of plant retired.

Net Salvage Considerations

The estimates of future net salvage are expressed as percentages of surviving plant in service, that is, all future retirements. In cases in which removal costs are expected to exceed salvage receipts, a negative net salvage percentage is estimated. The net salvage estimates were based on judgment which incorporated analyses of historical cost of removal and salvage data, expectations with respect to future removal requirements and markets for retired equipment and materials.

The analyses of historical cost of removal and salvage data are presented in the section titled “Net Salvage Statistics” for the plant accounts in which the net salvage estimate relied partially on those analyses.

Statistical analyses of historical data for the period 1992 through 2018 contributed significantly toward the net salvage estimates for 27 plant accounts, although in some instances the estimates are conservative (that is, less negative than the historical data). These accounts, which represent 93 percent of the depreciable plant, are as follows:

<u>Account No.</u>	<u>Account Description</u>
STORAGE PLANT	
350.20	Rights of Way
351.00	Structures and Improvements
352.00	Wells
353.00	Pipelines
354.00	Compressor Station Equipment

- 355.00 Measuring and Regulating Equipment
- 356.00 Purification Equipment
- 357.00 Other Equipment

TRANSMISSION PLANT

- 367.00 Mains – Cathodic Protection
- 367.01 Mains - Steel
- 369.00 Measuring and Regulating Station Equipment

DISTRIBUTION PLANT

- 375.00 Structures and Improvements
- 376.00 Mains – Cathodic Protection
- 376.01 Mains – Steel
- 376.02 Mains - Plastic
- 378.00 Measuring and Regulating Station Equipment
- 379.00 Measuring and Regulating Station Equipment – City Gate
- 380.00 Services
- 381.00 Meters
- 382.00 Meter Installations
- 383.00 House Regulators
- 384.00 House Regulator Installations
- 385.00 Industrial Measuring and Regulating Equipment
- 387.00 Other Equipment

GENERAL PLANT

- 390.00 Structures and Improvements
- 392.00 Transportation Equipment
- 396.00 Power Operated Equipment

The analysis for Account 380.00, Services, is used to illustrate the manner in which the study was conducted for the groups in the preceding list. Net salvage data for the period 1992 through 2018 were analyzed for this account. The data include cost of removal, gross salvage and net salvage amounts and each of these amounts is expressed as a percent of the original cost of regular retirements. Three-year moving averages for the 1992-1994 through 2016-2018 periods were computed to smooth the annual amounts.

Cost of removal for the 27-year period averaged 74 percent. Cost of removal for the most recent five years averaged 77 percent. Gross salvage was relatively limited

during the 27-year period. The most recent five-year average gross salvage of 0 percent gross salvage is indicative of the future and relatively consistent with the entire period.

The Company's accounting for the cost of removal for replacement projects for this account has changed since the last depreciation study. A time and motion study was performed and its recommendations were implemented beginning in fiscal year 2016. For this reason, the net salvage indications for 2016 through 2018 were given more consideration than prior years. Additionally, analysis was reviewed in which the historical data were adjusted to be more consistent with the Company's current accounting. The recommended negative 40 percent net salvage estimate is less negative than the overall average net salvage percent indicated by the historical data and less negative than the estimate of negative 65 percent from the previous depreciation study. It is also relatively consistent with the most recent three-year average net salvage of negative 39 percent. In future depreciation studies, in which more data will be available based on the current accounting practices, this estimate can be reviewed and updated as appropriate.

The net salvage percents for the remaining accounts were based on judgment incorporating estimates of previous studies of this and other gas utilities. For the amortized general plant accounts, the net salvage estimates were zero percent, consistent with amortization accounting.

**PART V. CALCULATION OF ANNUAL AND
ACCRUED DEPRECIATION**

PART V. CALCULATION OF ANNUAL AND ACCRUED DEPRECIATION

After the survivor curve and net salvage are estimated, the annual depreciation accrual rate can be calculated. In the average service life procedure, the annual accrual rate is computed by the following equation:

$$\text{Annual Accrual Rate, Percent} = \frac{(100\% - \text{Net Salvage, Percent})}{\text{Average Service Life}}$$

The calculated accrued depreciation for each depreciable property group represents that portion of the depreciable cost of the group which will not be allocated to expense through future depreciation accruals, if current forecasts of life characteristics are used as a basis for straight line depreciation accounting.

The accrued depreciation calculation consists of applying an appropriate ratio to the surviving original cost of each vintage of each account, based upon the attained age and the estimated survivor curve. The accrued depreciation ratios are calculated as follows:

$$\text{Ratio} = (1 - \frac{\text{Average Remaining Life Expectancy}}{\text{Average Service Life}}) (1 - \text{Net Salvage, Percent}).$$

The application of these procedures is described for a single unit of property and a group of property units. Net salvage is omitted from the depreciation for ease of application.

Single Unit of Property

The calculation of straight-line depreciation for a single unit of property is straightforward. For example, if a \$1,000 unit of property attains an age of four years and has a life expectancy of six years, the annual accrual over the total life is:

$$\frac{\$1,000}{(4 + 6)} = \$100 \text{ per year.}$$

The accrued depreciation is:

$$\$1,000 \left(1 - \frac{6}{10}\right) = \$400.$$

Group Depreciation Procedures

When more than a single item of property is under consideration, a group procedure for depreciation is appropriate because normally all of the items within a group do not have identical service lives but have lives that are dispersed over a range of time. There are two primary group procedures, namely, average service life and equal life group.

Average Service Life Procedure

In the average service life procedure, the rate of annual depreciation is based on the average service life of the group, and this rate is applied to the surviving balances of the group's cost. The accrued depreciation is based on the average service life of the group and the average remaining life of each vintage within the group derived from the area under the survivor curve between the attained age of the vintage and the maximum age.

A characteristic of this procedure is that the cost of plant retired prior to average life is not fully recouped at the time of retirement, whereas the cost of plant retired subsequent to average life is more than fully recouped. Over the entire life cycle, the portion of cost not recouped prior to average life is balanced by the excess cost recouped

subsequent to average life. The recovery of cost is complete at the end of the life cycle, but the distribution of capital cost to annual expense does not match the consumption of service value of plant.

Equal Life Group Procedure

In the equal life group procedure, also known as the unit summation procedure, the property group is subdivided according to service life. That is, each equal life group includes that portion of the property which experiences the life of that specific group. The relative size of each equal life group is determined from the property's life dispersion curve. The calculated depreciation for the property group is the summation of the calculated depreciation based on the service life of each equal life unit.

This procedure eliminates the need to base annual depreciation expense on average lives, inasmuch as each group has a single life. The full cost of short-lived items is accrued during their lives, leaving no deferral of accruals required to be added to the annual cost associated with long-lived items. The depreciation expense for the property group is the summation of the depreciation expense based on the service life of each equal life group.

The table on the following page presents an illustration of the calculation of equal life group depreciation using the Iowa 11-S2.5 survivor curve, net salvage of 0 percent and a September 30, 2018 calculation date.

DETAILED COMPUTATION OF ANNUAL AND ACCRUED FACTORS USING THE EQUAL LIFE GROUP PROCEDURE

INPUT PARAMETERS:

CALCULATION DATE.. 9-30-2018
 SURVIVOR CURVE.... 8-L3
 IN-SERVICE MONTH.. 3.00

AGE	INTERVAL	RETIREMENTS		GROUP ANNUAL ACCUAL (5)=(4)/(3)	YEAR	SUMMATION OF ANNUAL ACCUALS (7)	AVERAGE PERCENT SURVIVING (8)	ANNUAL FACTOR (9)	ACCURED FACTOR (10)
		BEG	END						
(1)	(2)	(3)	(4)	(5)	(6)	(7)	(8)	(9)	(10)
0.000	1.000	0.500	0.00376	0.00376000000	2018	14.17768405889	99.999590	0.1418	0.0709
1.000	2.000	1.500	0.24027	0.16018000000	2017	14.09383405889	99.876105	0.1411	0.2117
2.000	3.000	2.500	1.13394	0.45357600000	2016	13.78695605889	99.189000	0.1390	0.3475
3.000	4.000	3.500	2.79415	0.79832857143	2015	13.16100377317	97.224955	0.1354	0.4739
4.000	5.000	4.500	6.30748	1.40166222222	2014	12.06100837635	92.674138	0.1301	0.5855
5.000	6.000	5.500	12.18168	2.21485090909	2013	10.25275181069	83.429558	0.1229	0.6760
6.000	7.000	6.500	16.82914	2.58909846154	2012	7.85077712538	68.924150	0.1139	0.7404
7.000	8.000	7.500	16.69538	2.22605066667	2011	5.44320256127	52.161890	0.1044	0.7830
8.000	9.000	8.500	13.15300	1.54741176471	2010	3.55647134558	37.237700	0.0955	0.8118
9.000	10.000	9.500	9.46341	0.99614842105	2009	2.28469125270	25.929495	0.0881	0.8370
10.000	11.000	10.500	6.93140	0.66013333333	2008	1.45655037551	17.732090	0.0821	0.8621
11.000	12.000	11.500	5.22400	0.45426086957	2007	0.89935327406	11.654390	0.0772	0.8878
12.000	13.000	12.500	3.81853	0.30548240000	2006	0.51948163928	7.133125	0.0728	0.9100
13.000	14.000	13.500	2.57266	0.19056740741	2005	0.27145673557	3.937530	0.0689	0.9302
14.000	15.000	14.500	1.52861	0.10542137931	2004	0.12346234221	1.886893	0.0654	0.9483
15.000	16.000	15.500	0.76233	0.04918258065	2003	0.04616036223	0.741423	0.0623	0.9657
16.000	17.000	16.500	0.28827	0.01747090909	2002	0.01283361736	0.216123	0.0594	0.9801
17.000	18.000	17.500	0.06696	0.00382628571	2001	0.00218501996	0.038508	0.0567	0.9923
18.000	19.000	18.500	0.00502	0.00027135135	2000	0.00013620143	0.002518	0.0541	1.0000
19.000	19.040	19.020	0.00001	0.00000052576	1999	0.00000001052	0.000000	0.0000	1.0000

TOTAL 100.00000

In the table, each equal life group is defined by the age interval shown in columns 1 and 2. These are the ages at which the first and last retirement of each group occurs, and the group's equal life, shown in column 3, is the midpoint of the interval. For purposes of the calculation, the computer is programmed to divide each vintage into equal life groups arranged so that the midpoint of each one-year age interval coincides with the calculation date, September 30 in this case. This enables the calculation of annual accruals for a twelve-month period centered on the date of calculation.

The retirement during the age interval, shown in column 4, is the size of each equal life group (in percent) and is derived from the Iowa 8-L3 survivor curve. It is the difference between the percents surviving at the beginning and end of the age interval.

Each equal life group's annual accrual, shown in column 5, equals the group's size (column 4) divided by its life (column 3) and multiplied by the quantity one minus the net

salvage percent, with the exception of 2018 installations. For 2018 installations, the group annual accrual is equal to the retirements during the interval multiplied by one minus the net salvage percent.

Columns 6 through 10 show the derivation of the annual factor and accrued factor for each vintage based on the information developed in the first five columns. The year installed is shown in column 6. For all vintages other than 2018, the summation of annual accruals for each year installed, shown in column 7, is calculated by adding one-half of the group annual accrual (column 5) for that vintage's current age interval plus the group annual accruals for all succeeding age intervals. For example, the figure 14.09383405889 for 2017 equals one-half of 0.16018000000 plus all of the succeeding figures in column 5. Only one-half of the annual accrual for the vintage's current age interval group is included in the summation because the equal life group for that interval has reached the year during which it is expected to be retired.

The summation of annual accruals (column 7) for installations during 2018 are calculated on the basis of an in-service date at the midpoint of the year, i.e., March 31. Inasmuch as the overall calculation is centered on September 30, 2018, the first figure in column 7, for vintage 2018, equals all of the group annual accrual for the first equal life group plus the accruals for all of the subsequent equal life groups.

The average percent surviving, derived from the Iowa 8-L3 survivor curve, is shown in column 8 for each age interval. The annual factor, shown in column 9, is the result of dividing the summation of annual accruals (column 7) by the average percent surviving (column 8).

The accrued factor, shown in column 10, equals the annual factor multiplied by the age of the group at September 30, 2018.

REMAINING LIFE ANNUAL ACCRUAL RATES

The annual depreciation accrual rates are calculated as of September 30, 2018 and based on the straight-line remaining life method using the equal life group procedure. For the purpose of calculating the composite remaining life accrual rates as of September 30, 2018, the book reserve for each plant account is allocated among vintages in proportion to the calculated accrued depreciation for the account as of September 30, 2018. The remaining life annual accrual for each vintage is determined by dividing future book accruals (original cost less book reserve) by the composite remaining life for the surviving original cost of that vintage. The composite remaining life is derived by compositing the individual equal life group remaining lives in accordance with the following equation:

$$\text{Composite Remaining Life} = \frac{\sum \left(\frac{\text{Book Cost}}{\text{Life}} \times \text{Remaining Life} \right)}{\sum \frac{\text{Book Cost}}{\text{Life}}}.$$

The book costs and lives of the several equal life groups which are summed in the above equation are defined by the estimated future survivor curve.

Since book cost divided by life equals the whole life annual accrual, the previous equation reduces to the following form:

$$\text{Composite Remaining Life} = \frac{\sum \text{Whole Life Future Accruals}}{\sum \text{Whole Life Annual Accruals}}$$

or

$$\text{Composite Remaining Life} = \frac{\sum \text{Book Cost} - \text{Calc. Reserve}}{\sum \text{Whole Life Annual Accrual}}.$$

The composite remaining life calculations were made using computer software that utilizes detailed ELG calculations of whole life future accruals and annual accruals in order to derive the vintage composite remaining lives. The annual accrual rate for each account is equal to the sum of the remaining life annual accruals divided by the total original cost. The composite remaining life is calculated by dividing the sum of the future book accruals by the sum of the remaining life annual accruals.

CALCULATION OF ANNUAL AND ACCRUED AMORTIZATION

Amortization is the gradual extinguishment of an amount in an account by distributing such amount over a fixed period, over the life of the asset or liability to which it applies, or over the period during which it is anticipated the benefit will be realized. Normally, the distribution of the amount is in equal amounts to each year of the amortization period.

The calculation of annual and accrued amortization requires the selection of an amortization period. The amortization periods used in this report were based on judgment which incorporated a consideration of the period during which the assets will render most of their service, the amortization period and service lives used by other utilities, and the service life estimates previously used for the asset under depreciation accounting.

Amortization accounting is proposed for several accounts that represent numerous units of property but only a small portion of depreciable gas plant in service. The accounts and their amortization periods are as follows:

<u>ACCOUNT</u>	<u>TITLE</u>	<u>AMORTIZATION PERIOD (YEARS)</u>
376.03	Mains – Anodes	15
376.04	Mains – Leak Clamps	14
391.00	Office Furniture and Equipment	15
393.00	Stores Equipment	25
394.00	Tools, Shop and Garage Equipment	20
395.00	Laboratory Equipment	15
397.00	Communication Equipment	15
397.02	Fixed Radios	15
398.00	Miscellaneous Equipment	20
399.01	Servers Hardware	7
399.02	Servers Software	7
399.03	Network Hardware	7
399.06	PC Hardware	5
399.07	PC Software	5
399.08	Application Software	7

For the purpose of calculating annual amortization amounts as of September 30, 2018, the book depreciation reserve for each plant account or subaccount is assigned or allocated to vintages. The book reserve assigned to vintages with an age greater than the amortization period is equal to the vintage's original cost. The remaining book reserve is allocated among vintages with an age less than the amortization period in proportion to the calculated accrued amortization. The calculated accrued amortization is equal to the original cost multiplied by the ratio of the vintage's age to its amortization period. The annual amortization amount is determined by dividing the future amortizations (original cost less allocated book reserve) by the remaining period of amortization for the vintage.

PART VI. RESULTS OF STUDY

PART VI. RESULTS OF STUDY

QUALIFICATION OF RESULTS

The calculated annual and accrued depreciation are the principal results of the study. Continued surveillance and periodic revisions are normally required to maintain continued use of appropriate annual depreciation accrual rates. An assumption that accrual rates can remain unchanged over a long period of time implies a disregard for the inherent variability in service lives and net salvage and for the change of the composition of property in service. The annual accrual rates were calculated in accordance with the straight-line remaining life method of depreciation, using the equal life group procedure based on estimates which reflect considerations of current historical evidence and expected future conditions.

The annual depreciation accrual rates are applicable specifically to the gas plant in service as of September 30, 2018. For most plant accounts, the application of such rates to future balances, that reflect additions subsequent to September 30, 2018, is reasonable for a period of three to five years.

DESCRIPTION OF DETAILED TABULATIONS

Table 1 is a summary of the results of the study as applied to the original cost of gas plant at September 30, 2018 presented on pages VI-4 and VI-5 of this report.

The service life estimates were based on judgment that incorporated statistical analysis of retirement data, discussions with management and consideration of estimates made for other gas utilities. The results of the statistical analysis of service life are presented in the section beginning on page VII-2, within the supporting documents of this report.

For each depreciable group analyzed by the retirement rate method, a chart depicting the original and estimated survivor curves followed by a tabular presentation of

the original life table(s) plotted on the chart. The survivor curves estimated for the depreciable groups are shown as dark smooth curves on the charts. Each smooth survivor curve is denoted by a numeral followed by the curve type designation. The numeral used is the average life derived from the entire curve from 100 percent to zero percent surviving. The titles of the chart indicate the group, the symbol used to plot the points of the original life table, and the experience and placement bands of the life tables which were plotted. The experience band indicates the range of years for which retirements were used to develop the stub survivor curve. The placements indicate, for the related experience band, the range of years of installations which appear in the experience.

The analyses of net salvage data are presented in the section titled, "Net Salvage Statistics". The tabulations present annual cost of removal and salvage data, three-year moving averages and the most recent five-year average. Data are shown in dollars and as percentages of original costs retired.

The tables of the calculated annual depreciation applicable to depreciable assets as of September 30, 2018 are presented in account sequence starting on page IX-2 of the supporting documents. The tables indicate the estimated survivor curve and net salvage percent for the account and set forth, for each installation year, the original cost, the calculated accrued depreciation, the allocated book reserve, future accruals, the remaining life, and the calculated annual accrual amount.

ATMOS ENERGY CORPORATION
KANSAS DIVISION

TABLE 1. SUMMARY OF ESTIMATED SURVIVOR CURVES, NET SALVAGE PERCENTS, ORIGINAL COST, BOOK RESERVE AND CALCULATED ANNUAL DEPRECIATION ACCRUAL RATES AS OF SEPTEMBER 30, 2018

ACCOUNT (1)	SURVIVOR CURVE (2)	NET SALVAGE (3)	ORIGINAL COST AS OF SEPTEMBER 30, 2018 (4)	BOOK DEPRECIATION RESERVE (5)	FUTURE ACCRUALS (6)	CALCULATED ANNUAL ACCRUAL RATE (8)=(7)/(4)	COMPOSITE REMAINING LIFE (9)=(6)/(7)
STORAGE PLANT							
350.20 RIGHTS OF WAY	50-R5	(10)	568,935.31	471,671	154,158	7,228	1.27
351.00 STRUCTURES AND IMPROVEMENTS	50-R4	(10)	102,922.98	97,129	16,086	691	0.67
352.00 WELLS	50-S4	(10)	1,391,004.89	567,729	962,376	41,069	2.95
FULLY ACCRUED			36,514.65	36,515	0	-	23.4
352.02 RESERVOIRS							-
353.00 PIPELINES	60-R4	(10)	1,156,753.92	511,605	760,824	22,916	1.98
354.00 COMPRESSOR STATION EQUIPMENT	50-S2	(10)	2,570,713.36	1,195,565	1,632,220	57,640	2.24
355.00 MEASURING AND REGULATING EQUIPMENT	40-S3	(10)	220,010.72	220,011	965	0.44	22.8
356.00 PURIFICATION EQUIPMENT	40-R4	(10)	288,382.11	288,382	1,867	0.65	15.4
357.00 OTHER EQUIPMENT	36-S3	(10)	125,321.36	125,321	1,318	1.05	9.5
TOTAL STORAGE PLANT			6,460,559.30	3,513,928	3,589,035	133,694	2.07
TRANSMISSION PLANT							
367.00 MAINS - CATHODIC PROTECTION	55-R2	(25)	1,511,138.93	169,948	1,718,976	73,332	4.85
367.01 MAINS - STEEL	55-R2	(25)	115,654.77	23,462	121,106	3,222	2.79
369.00 MEASURING AND REGULATING STATION EQUIPMENT	40-R2	(5)	147,567.11	56,318	98,627	4,030	2.73
TOTAL TRANSMISSION PLANT			1,774,360.81	249,728	1,938,709	80,554	4.54
DISTRIBUTION PLANT							
374.02 RIGHTS OF WAY	60-R4	0	333,483.38	113,924	219,559	5,236	1.57
375.00 STRUCTURES AND IMPROVEMENTS	35-S0	(5)	152,684.89	111,474	48,845	2,704	1.77
376.00 MAINS - CATHODIC PROTECTION	55-R2	(25)	4,475,503.47	1,484,148	4,160,231	125,380	2.80
376.01 MAINS - STEEL	55-R2	(25)	59,621,101.28	2,878,374	71,648,003	2,351,933	3.94
376.02 MAINS - PLASTIC	55-R2	(25)	116,666,085.42	28,351,429	117,481,178	3,374,200	2.89
376.03 MAINS - ANODES							
FULLY ACCRUED							
AMORTIZED							
TOTAL ACCOUNT 376.03	15-SQ	0	1,055,339.36	1,055,339	0	0	-
376.04 MAINS - LEAK CLAMPS			6,418,561.14	2,759,000	3,659,561	428,144	6.67
FULLY ACCRUED							
AMORTIZED							
TOTAL ACCOUNT 376.04	14-SQ	0	7,473,900.50	3,814,339	3,659,561	428,144	5.73
376.05 MAINS - LEAK CLAMPS							
FULLY ACCRUED							
AMORTIZED							
TOTAL ACCOUNT 376.04							
378.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE							
379.00 MEASURING AND REGULATING STATION EQUIPMENT	36-S0	(10)	5,606,146.10	1,638,302	4,528,459	250,549	4.47
SERVICES	40-R2	(5)	3,504,195.85	855,193	2,824,213	125,344	3.58
METERS	44-R2	(40)	82,330,078.73	33,146,662	82,115,448	3,068,556	3.73
METER INSTALLATIONS	20-R3	0	28,447,818.39	16,450,304	12,017,514	847,556	2.98
HOUSE REGULATORS	25-R1.5	(5)	28,114,454.07	8,020,072	21,500,084	1,619,404	5.76
HOUSE REGULATORS	25-R1.5	(5)	20,108,000	242,840	1,868,508	241,997	12.03
INDUSTRIAL MEASURING AND REGULATING EQUIPMENT	30-R1.5	(10)	151,354	68,581	12,131	5.79	7.7
INDUSTRIAL MEASURING AND REGULATING EQUIPMENT	30-R1.5	(10)	1,830,296.06	584,512	1,428,814	81,339	4.45
OTHER EQUIPMENT	20-R4	(5)	628,454.28	627,586	32,291	3,890	0.62
TOTAL DISTRIBUTION PLANT			349,861,308.09	105,177,421	325,281,237	12,754,557	25.5

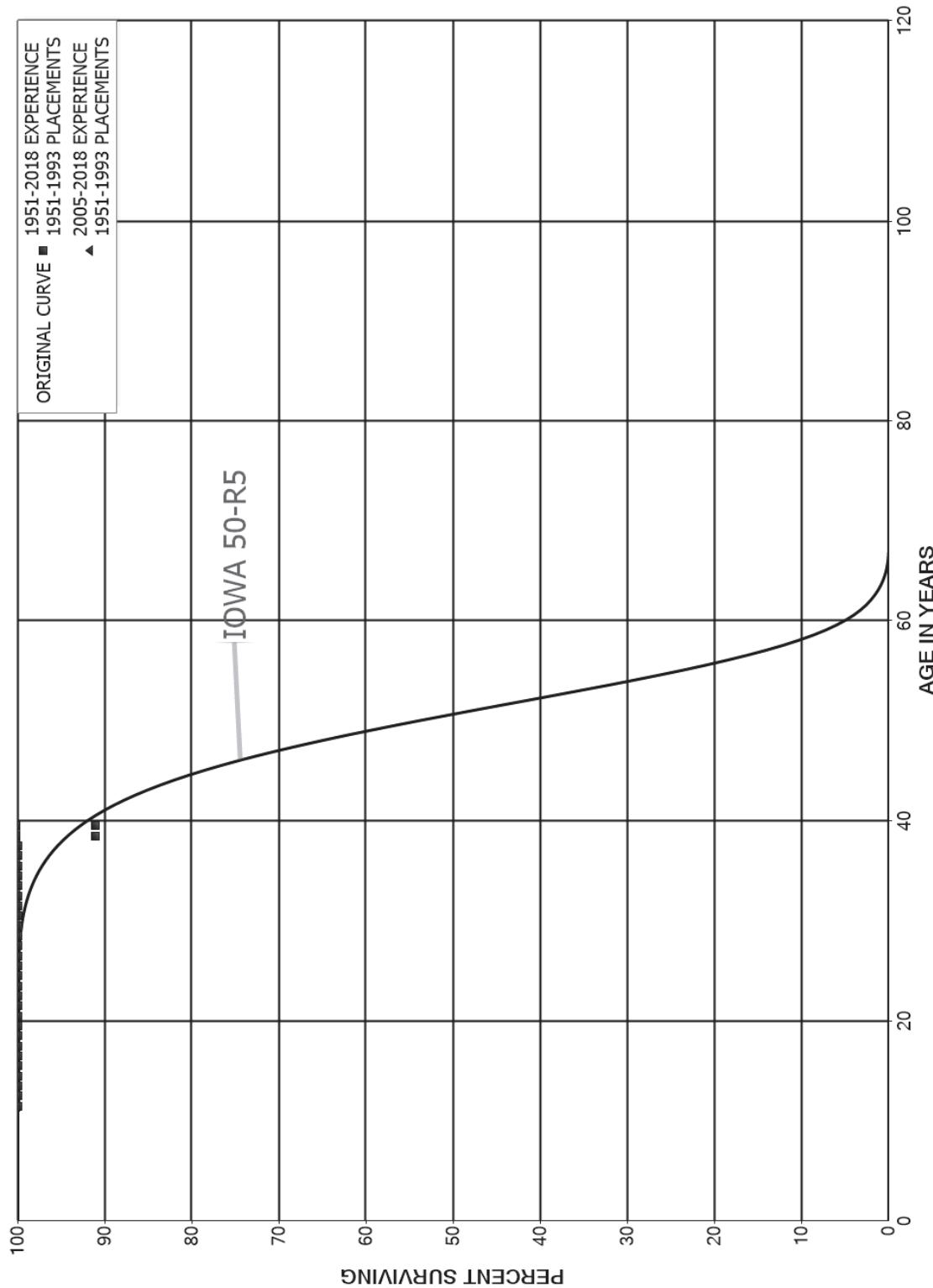
ATMOS ENERGY CORPORATION
KANSAS DIVISION

TABLE 1. SUMMARY OF ESTIMATED SURVIVOR CURVES, NET SALVAGE PERCENTS, ORIGINAL COST, BOOK RESERVE AND CALCULATED ANNUAL DEPRECIATION ACCRUAL RATES AS OF SEPTEMBER 30, 2018

ACCOUNT (1)	SURVIVOR CURVE (2)	NET SALVAGE (3)	ORIGINAL COST AS OF SEPTEMBER 30, 2018 (4)	BOOK DEPRECIATION RESERVE (5)	FUTURE ACCRUALS (6)	CALCULATED ANNUAL ACCRUAL RATE (8)=(7)/(4) (7)	COMPOSITE REMAINING LIFE (9)=(6)/(7)
GENERAL PLANT							
390.00 STRUCTURES AND IMPROVEMENTS	40-R1.5	(5)	2,200,666.71	562,774	1,747,926	72,438	24.1
390.08 LEASEHOLD IMPROVEMENTS	30-R2	0	39,013.13	22,462	16,551	1,509	3.87
391.00 OFFICE FURNITURE AND EQUIPMENT	15-SQ	0	483,974.70	319,500	164,475	32,284	5.1
392.00 TRANSPORTATION EQUIPMENT	8-L3	10	327,475.32	211,399	83,329	43,370	13.24
393.00 STORES EQUIPMENT	25-SQ	0	15,268.15	1,432	13,836	610	4.00
394.00 TOOLS, SHOP AND GARAGE EQUIPMENT	20-SQ	0	3,892,130.60	1,295,700	2,596,431	194,563	22.7
395.00 LABORATORY EQUIPMENT	15-SQ	0	12,933.38	9,913	3,020	863	13.3
396.00 POWER OPERATED EQUIPMENT	9-SQ.5	5	28,786.18	23,735	3,612	1,105	3.5
397.00 COMMUNICATION EQUIPMENT	15-SQ	0	670,634.10	324,333	346,301	44,710	3.3
397.02 FIXED RADIOS	15-SQ	0	250,007.12	93,152	156,855	16,681	6.67
398.00 MISCELLANEOUS EQUIPMENT	15-SQ	0	281,077.59	88,081	192,987	18,741	9.4
399.01 SERVERS HARDWARE	7-SQ	0	47,499.04	23,093	24,406	6,789	16.67
399.02 SERVERS SOFTWARE	7-SQ	0	15,235.37	3,261	11,974	2,177	10.3
399.03 NETWORK HARDWARE	7-SQ	0	449,831.37	222,052	227,779	64,285	14.29
399.06 PC HARDWARE							
FULLY ACCRUED							
AMORTIZED							
TOTAL ACCOUNT 399.06	5-SQ	0	256,017.00	286,017	0	0	3.6
				430,850	297,637	145,715	5.5
				686,867	297,637	145,715	3.5
399.07 PC SOFTWARE							
FULLY ACCRUED							
AMORTIZED							
TOTAL ACCOUNT 399.07	5-SQ	0	14,249.25	14,249	0	0	-
			57,076.53	26,527	30,550	11,414	2.7
			71,325.78	40,776	30,550	11,414	2.7
399.08 APPLICATION SOFTWARE							
TOTAL GENERAL PLANT	7-SQ	0	736,829.93	631,513	105,317	105,317	1.0
TOTAL DEPRECIABLE PLANT			10,507,192.51	4,560,043	6,022,996	762,511	14.29
NONDEPRECIABLE AND ACCOUNTS NOT STUDIED				368,603,420.71	113,501,120	336,831,977	7.9
301.00 ORGANIZATION							
302.00 FRANCHISES AND CONSENTS							
303.00 MISCELLANEOUS INTANGIBLE PLANT							
350.10 LAND							
365.00 LAND AND LAND RIGHTS							
374.00 LAND AND LAND RIGHTS							
389.00 LAND AND LAND RIGHTS							
TOTAL NONDEPRECIABLE AND ACCOUNTS NOT STUDIED							
TOTAL GAS PLANT							
TOTAL							
369,521,885.71							
113,491,075							

PART VII. SERVICE LIFE STATISTICS

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 350.20 RIGHTS OF WAY
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 350.20 RIGHTS OF WAY

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-1993

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	572,146		0.0000	1.0000	100.00
0.5	572,146	166	0.0003	0.9997	100.00
1.5	571,980		0.0000	1.0000	99.97
2.5	571,980		0.0000	1.0000	99.97
3.5	571,980		0.0000	1.0000	99.97
4.5	571,980		0.0000	1.0000	99.97
5.5	571,980		0.0000	1.0000	99.97
6.5	571,980		0.0000	1.0000	99.97
7.5	571,980	77	0.0001	0.9999	99.97
8.5	571,903		0.0000	1.0000	99.96
9.5	571,903		0.0000	1.0000	99.96
10.5	571,903		0.0000	1.0000	99.96
11.5	571,903		0.0000	1.0000	99.96
12.5	571,903		0.0000	1.0000	99.96
13.5	571,903		0.0000	1.0000	99.96
14.5	571,903		0.0000	1.0000	99.96
15.5	571,903		0.0000	1.0000	99.96
16.5	571,903		0.0000	1.0000	99.96
17.5	571,903		0.0000	1.0000	99.96
18.5	571,903		0.0000	1.0000	99.96
19.5	571,903		0.0000	1.0000	99.96
20.5	571,903		0.0000	1.0000	99.96
21.5	571,903		0.0000	1.0000	99.96
22.5	571,903		0.0000	1.0000	99.96
23.5	571,903		0.0000	1.0000	99.96
24.5	571,903		0.0000	1.0000	99.96
25.5	435,895	195	0.0004	0.9996	99.96
26.5	435,699		0.0000	1.0000	99.91
27.5	435,699		0.0000	1.0000	99.91
28.5	62,066		0.0000	1.0000	99.91
29.5	31,462		0.0000	1.0000	99.91
30.5	31,462		0.0000	1.0000	99.91
31.5	31,462		0.0000	1.0000	99.91
32.5	31,462		0.0000	1.0000	99.91
33.5	31,462		0.0000	1.0000	99.91
34.5	31,462		0.0000	1.0000	99.91
35.5	31,462		0.0000	1.0000	99.91
36.5	31,462		0.0000	1.0000	99.91
37.5	31,462	2,772	0.0881	0.9119	99.91
38.5	28,689		0.0000	1.0000	91.11

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 350.20 RIGHTS OF WAY

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-1993

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	24,448	0.0000	1.0000	91.11	
40.5	24,448	0.0000	1.0000	91.11	
41.5	24,448	0.0000	1.0000	91.11	
42.5	24,448	0.0000	1.0000	91.11	
43.5	24,448	0.0000	1.0000	91.11	
44.5	24,448	0.0000	1.0000	91.11	
45.5	24,448	0.0000	1.0000	91.11	
46.5	24,448	0.0000	1.0000	91.11	
47.5	24,448	0.0000	1.0000	91.11	
48.5	24,448	0.0000	1.0000	91.11	
49.5	24,448	0.0000	1.0000	91.11	
50.5	24,448	0.0000	1.0000	91.11	
51.5	24,448	0.0000	1.0000	91.11	
52.5	24,448	0.0000	1.0000	91.11	
53.5	24,448	0.0000	1.0000	91.11	
54.5	24,448	0.0000	1.0000	91.11	
55.5	24,448	0.0000	1.0000	91.11	
56.5	24,448	0.0000	1.0000	91.11	
57.5	24,448	0.0000	1.0000	91.11	
58.5	24,448	0.0000	1.0000	91.11	
59.5	24,448	0.0000	1.0000	91.11	
60.5	24,448	0.0000	1.0000	91.11	
61.5	24,448	0.0000	1.0000	91.11	
62.5	17,929	0.0000	1.0000	91.11	
63.5	11,629	0.0000	1.0000	91.11	
64.5	11,629	0.0000	1.0000	91.11	
65.5	11,629	0.0000	1.0000	91.11	
66.5	11,629	0.0000	1.0000	91.11	
67.5					91.11

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 350.20 RIGHTS OF WAY

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-1993

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0					
0.5					
1.5					
2.5					
3.5					
4.5					
5.5					
6.5					
7.5					
8.5					
9.5					
10.5					
11.5	136,008	0.0000	1.0000	100.00	
12.5	136,008	0.0000	1.0000	100.00	
13.5	136,008	0.0000	1.0000	100.00	
14.5	509,642	0.0000	1.0000	100.00	
15.5	540,246	0.0000	1.0000	100.00	
16.5	540,246	0.0000	1.0000	100.00	
17.5	540,246	0.0000	1.0000	100.00	
18.5	540,246	0.0000	1.0000	100.00	
19.5	540,246	0.0000	1.0000	100.00	
20.5	540,246	0.0000	1.0000	100.00	
21.5	540,246	0.0000	1.0000	100.00	
22.5	540,246	0.0000	1.0000	100.00	
23.5	540,246	0.0000	1.0000	100.00	
24.5	540,246	0.0000	1.0000	100.00	
25.5	408,479	0.0000	1.0000	100.00	
26.5	408,479	0.0000	1.0000	100.00	
27.5	408,479	0.0000	1.0000	100.00	
28.5	34,845	0.0000	1.0000	100.00	
29.5	4,241	0.0000	1.0000	100.00	
30.5	4,241	0.0000	1.0000	100.00	
31.5	4,241	0.0000	1.0000	100.00	
32.5	4,241	0.0000	1.0000	100.00	
33.5	4,241	0.0000	1.0000	100.00	
34.5	4,241	0.0000	1.0000	100.00	
35.5	4,241	0.0000	1.0000	100.00	
36.5	4,241	0.0000	1.0000	100.00	
37.5	4,241	0.0000	1.0000	100.00	
38.5	4,241	0.0000	1.0000	100.00	

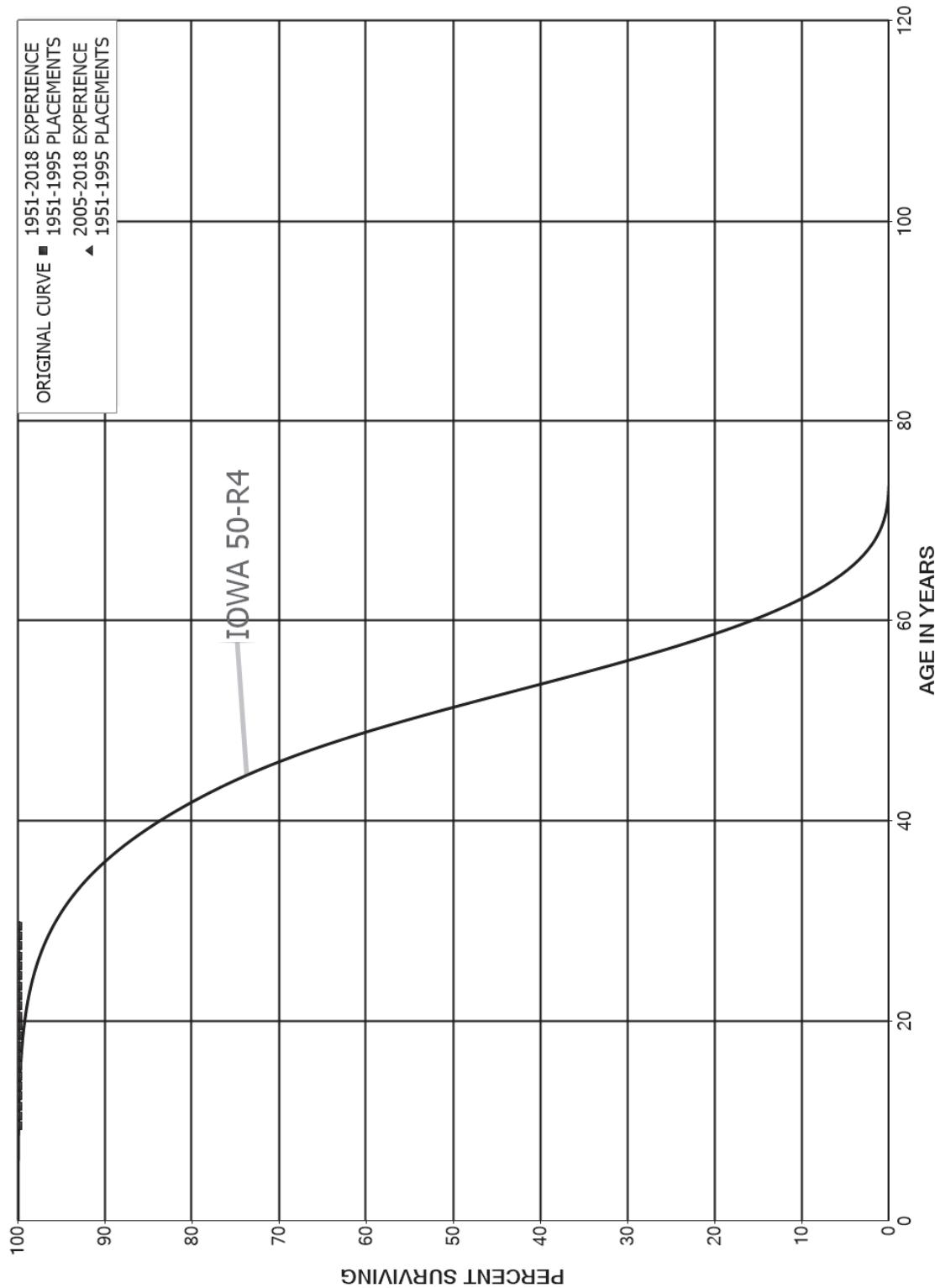
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 350.20 RIGHTS OF WAY

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-1993		EXPERIENCE BAND 2005-2018			
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5					100.00
40.5					
41.5					
42.5					
43.5					
44.5					
45.5					
46.5					
47.5					
48.5	6,520	0.0000			
49.5	12,819	0.0000			
50.5	12,819	0.0000			
51.5	12,819	0.0000			
52.5	12,819	0.0000			
53.5	24,448	0.0000			
54.5	24,448	0.0000			
55.5	24,448	0.0000			
56.5	24,448	0.0000			
57.5	24,448	0.0000			
58.5	24,448	0.0000			
59.5	24,448	0.0000			
60.5	24,448	0.0000			
61.5	24,448	0.0000			
62.5	17,929	0.0000			
63.5	11,629	0.0000			
64.5	11,629	0.0000			
65.5	11,629	0.0000			
66.5	11,629	0.0000			
67.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 351.00 STRUCTURES AND IMPROVEMENTS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 351.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-1995

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	102,923	0.0000	1.0000	100.00	
0.5	102,923	0.0000	1.0000	100.00	
1.5	102,923	0.0000	1.0000	100.00	
2.5	102,923	0.0000	1.0000	100.00	
3.5	102,923	0.0000	1.0000	100.00	
4.5	102,923	0.0000	1.0000	100.00	
5.5	102,923	0.0000	1.0000	100.00	
6.5	102,923	0.0000	1.0000	100.00	
7.5	102,923	0.0000	1.0000	100.00	
8.5	102,923	0.0000	1.0000	100.00	
9.5	102,923	0.0000	1.0000	100.00	
10.5	102,923	0.0000	1.0000	100.00	
11.5	102,923	0.0000	1.0000	100.00	
12.5	102,923	0.0000	1.0000	100.00	
13.5	102,923	0.0000	1.0000	100.00	
14.5	102,923	0.0000	1.0000	100.00	
15.5	102,923	0.0000	1.0000	100.00	
16.5	102,923	0.0000	1.0000	100.00	
17.5	102,923	0.0000	1.0000	100.00	
18.5	102,923	0.0000	1.0000	100.00	
19.5	102,923	0.0000	1.0000	100.00	
20.5	102,923	0.0000	1.0000	100.00	
21.5	102,923	0.0000	1.0000	100.00	
22.5	102,923	0.0000	1.0000	100.00	
23.5	76,448	0.0000	1.0000	100.00	
24.5	62,077	0.0000	1.0000	100.00	
25.5	49,000	0.0000	1.0000	100.00	
26.5	49,000	0.0000	1.0000	100.00	
27.5	41,268	0.0000	1.0000	100.00	
28.5	1,677	0.0000	1.0000	100.00	
29.5	548	0.0000	1.0000	100.00	
30.5	548	0.0000	1.0000	100.00	
31.5	548	0.0000	1.0000	100.00	
32.5	548	0.0000	1.0000	100.00	
33.5	548	0.0000	1.0000	100.00	
34.5	513	0.0000	1.0000	100.00	
35.5	513	0.0000	1.0000	100.00	
36.5	513	0.0000	1.0000	100.00	
37.5	513	0.0000	1.0000	100.00	
38.5	513	0.0000	1.0000	100.00	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 351.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-1995

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	513	0.0000	1.0000	100.00	
40.5	513	0.0000	1.0000	100.00	
41.5	513	0.0000	1.0000	100.00	
42.5	440	0.0000	1.0000	100.00	
43.5	440	0.0000	1.0000	100.00	
44.5	440	0.0000	1.0000	100.00	
45.5	440	0.0000	1.0000	100.00	
46.5	440	0.0000	1.0000	100.00	
47.5	440	0.0000	1.0000	100.00	
48.5	440	0.0000	1.0000	100.00	
49.5	440	0.0000	1.0000	100.00	
50.5	440	0.0000	1.0000	100.00	
51.5	440	0.0000	1.0000	100.00	
52.5	440	0.0000	1.0000	100.00	
53.5	440	0.0000	1.0000	100.00	
54.5	440	0.0000	1.0000	100.00	
55.5	440	0.0000	1.0000	100.00	
56.5	440	0.0000	1.0000	100.00	
57.5	440	0.0000	1.0000	100.00	
58.5	440	0.0000	1.0000	100.00	
59.5	440	0.0000	1.0000	100.00	
60.5	440	0.0000	1.0000	100.00	
61.5	440	0.0000	1.0000	100.00	
62.5	440	0.0000	1.0000	100.00	
63.5	440	0.0000	1.0000	100.00	
64.5	440	0.0000	1.0000	100.00	
65.5	440	0.0000	1.0000	100.00	
66.5	440	0.0000	1.0000	100.00	
67.5					100.00

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 351.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-1995

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0					
0.5					
1.5					
2.5					
3.5					
4.5					
5.5					
6.5					
7.5					
8.5					
9.5	26,475	0.0000	1.0000	100.00	
10.5	40,846	0.0000	1.0000	100.00	
11.5	53,923	0.0000	1.0000	100.00	
12.5	53,923	0.0000	1.0000	100.00	
13.5	61,655	0.0000	1.0000	100.00	
14.5	101,246	0.0000	1.0000	100.00	
15.5	102,375	0.0000	1.0000	100.00	
16.5	102,375	0.0000	1.0000	100.00	
17.5	102,375	0.0000	1.0000	100.00	
18.5	102,375	0.0000	1.0000	100.00	
19.5	102,375	0.0000	1.0000	100.00	
20.5	102,410	0.0000	1.0000	100.00	
21.5	102,410	0.0000	1.0000	100.00	
22.5	102,410	0.0000	1.0000	100.00	
23.5	75,935	0.0000	1.0000	100.00	
24.5	61,564	0.0000	1.0000	100.00	
25.5	48,486	0.0000	1.0000	100.00	
26.5	48,486	0.0000	1.0000	100.00	
27.5	40,755	0.0000	1.0000	100.00	
28.5	1,237	0.0000	1.0000	100.00	
29.5	108	0.0000	1.0000	100.00	
30.5	108	0.0000	1.0000	100.00	
31.5	108	0.0000	1.0000	100.00	
32.5	108	0.0000	1.0000	100.00	
33.5	108	0.0000	1.0000	100.00	
34.5	74	0.0000	1.0000	100.00	
35.5	74	0.0000	1.0000	100.00	
36.5	74	0.0000	1.0000	100.00	
37.5	74	0.0000	1.0000	100.00	
38.5	74	0.0000	1.0000	100.00	

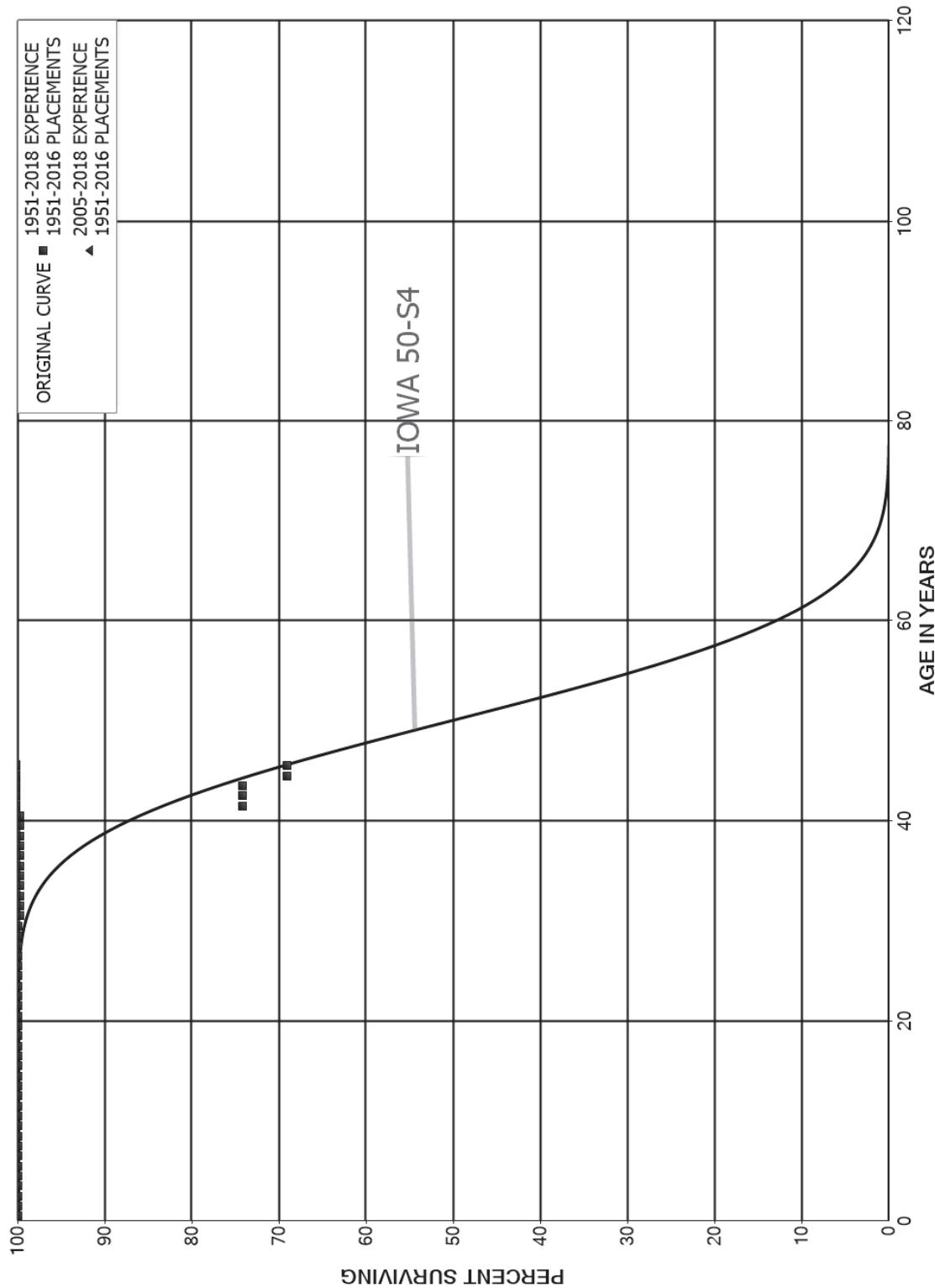
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 351.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-1995			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	74		0.0000	1.0000	100.00
40.5	74		0.0000	1.0000	100.00
41.5	74		0.0000	1.0000	100.00
42.5					100.00
43.5					
44.5					
45.5					
46.5					
47.5					
48.5					
49.5					
50.5					
51.5					
52.5					
53.5	440		0.0000		
54.5	440		0.0000		
55.5	440		0.0000		
56.5	440		0.0000		
57.5	440		0.0000		
58.5	440		0.0000		
59.5	440		0.0000		
60.5	440		0.0000		
61.5	440		0.0000		
62.5	440		0.0000		
63.5	440		0.0000		
64.5	440		0.0000		
65.5	440		0.0000		
66.5	440		0.0000		
67.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 352.00 WELLS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 352.00 WELLS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2016

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	1,446,144	0.0000	1.0000	100.00	
0.5	1,446,144	0.0000	1.0000	100.00	
1.5	1,446,144	0.0000	1.0000	100.00	
2.5	1,332,685	0.0000	1.0000	100.00	
3.5	1,275,172	0.0000	1.0000	100.00	
4.5	1,180,428	0.0000	1.0000	100.00	
5.5	1,180,428	0.0000	1.0000	100.00	
6.5	1,180,428	0.0000	1.0000	100.00	
7.5	1,166,513	0.0000	1.0000	100.00	
8.5	1,166,513	0.0000	1.0000	100.00	
9.5	1,166,513	0.0000	1.0000	100.00	
10.5	1,166,513	0.0000	1.0000	100.00	
11.5	1,166,513	0.0000	1.0000	100.00	
12.5	1,166,513	0.0000	1.0000	100.00	
13.5	1,166,513	0.0000	1.0000	100.00	
14.5	1,166,513	0.0000	1.0000	100.00	
15.5	1,166,513	0.0000	1.0000	100.00	
16.5	1,163,983	0.0000	1.0000	100.00	
17.5	1,089,850	0.0000	1.0000	100.00	
18.5	1,047,365	0.0000	1.0000	100.00	
19.5	1,047,365	0.0000	1.0000	100.00	
20.5	1,044,609	0.0000	1.0000	100.00	
21.5	1,019,428	0.0000	1.0000	100.00	
22.5	952,373	0.0000	1.0000	100.00	
23.5	952,373	0.0000	1.0000	100.00	
24.5	949,464	0.0000	1.0000	100.00	
25.5	713,474	0.0000	1.0000	100.00	
26.5	614,187	0.0000	1.0000	100.00	
27.5	614,187	0.0000	1.0000	100.00	
28.5	240,642	0.0000	1.0000	100.00	
29.5	132,456	416	0.0031	0.9969	100.00
30.5	132,040		0.0000	1.0000	99.69
31.5	128,170		0.0000	1.0000	99.69
32.5	128,170		0.0000	1.0000	99.69
33.5	120,253		0.0000	1.0000	99.69
34.5	120,253		0.0000	1.0000	99.69
35.5	120,253		0.0000	1.0000	99.69
36.5	120,253		0.0000	1.0000	99.69
37.5	120,138		0.0000	1.0000	99.69
38.5	116,437		0.0000	1.0000	99.69

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 352.00 WELLS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2016

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	116,437		0.0000	1.0000	99.69
40.5	116,437	29,814	0.2560	0.7440	99.69
41.5	86,624		0.0000	1.0000	74.16
42.5	86,624		0.0000	1.0000	74.16
43.5	86,624	5,962	0.0688	0.9312	74.16
44.5	80,661		0.0000	1.0000	69.06
45.5	80,661		0.0000	1.0000	69.06
46.5	80,661		0.0000	1.0000	69.06
47.5	80,656		0.0000	1.0000	69.06
48.5	80,656		0.0000	1.0000	69.06
49.5	80,656		0.0000	1.0000	69.06
50.5	73,908		0.0000	1.0000	69.06
51.5	73,404		0.0000	1.0000	69.06
52.5	72,886		0.0000	1.0000	69.06
53.5	72,886		0.0000	1.0000	69.06
54.5	72,886		0.0000	1.0000	69.06
55.5	70,399		0.0000	1.0000	69.06
56.5	70,399		0.0000	1.0000	69.06
57.5	70,399		0.0000	1.0000	69.06
58.5	66,955		0.0000	1.0000	69.06
59.5	66,950	629	0.0094	0.9906	69.06
60.5	64,433	486	0.0075	0.9925	68.41
61.5	62,005		0.0000	1.0000	67.89
62.5	60,008	1,168	0.0195	0.9805	67.89
63.5	56,503	1,524	0.0270	0.9730	66.57
64.5	50,914	2,064	0.0405	0.9595	64.77
65.5	43,346	1,794	0.0414	0.9586	62.15
66.5	37,068	11,282	0.3043	0.6957	59.58
67.5					41.44

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 352.00 WELLS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2016

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	279,631	0.0000	1.0000	100.00	
0.5	279,631	0.0000	1.0000	100.00	
1.5	279,631	0.0000	1.0000	100.00	
2.5	168,701	0.0000	1.0000	100.00	
3.5	185,322	0.0000	1.0000	100.00	
4.5	133,063	0.0000	1.0000	100.00	
5.5	133,063	0.0000	1.0000	100.00	
6.5	135,818	0.0000	1.0000	100.00	
7.5	147,085	0.0000	1.0000	100.00	
8.5	214,140	0.0000	1.0000	100.00	
9.5	214,140	0.0000	1.0000	100.00	
10.5	217,049	0.0000	1.0000	100.00	
11.5	453,039	0.0000	1.0000	100.00	
12.5	552,326	0.0000	1.0000	100.00	
13.5	552,326	0.0000	1.0000	100.00	
14.5	925,871	0.0000	1.0000	100.00	
15.5	1,034,057	0.0000	1.0000	100.00	
16.5	1,031,527	0.0000	1.0000	100.00	
17.5	961,264	0.0000	1.0000	100.00	
18.5	918,779	0.0000	1.0000	100.00	
19.5	926,696	0.0000	1.0000	100.00	
20.5	923,940	0.0000	1.0000	100.00	
21.5	898,759	0.0000	1.0000	100.00	
22.5	831,705	0.0000	1.0000	100.00	
23.5	831,819	0.0000	1.0000	100.00	
24.5	832,611	0.0000	1.0000	100.00	
25.5	596,620	0.0000	1.0000	100.00	
26.5	497,334	0.0000	1.0000	100.00	
27.5	497,334	0.0000	1.0000	100.00	
28.5	123,789	0.0000	1.0000	100.00	
29.5	15,602	0.0000	1.0000	100.00	
30.5	15,602	0.0000	1.0000	100.00	
31.5	11,732	0.0000	1.0000	100.00	
32.5	11,732	0.0000	1.0000	100.00	
33.5	3,821	0.0000	1.0000	100.00	
34.5	3,821	0.0000	1.0000	100.00	
35.5	3,821	0.0000	1.0000	100.00	
36.5	10,568	0.0000	1.0000	100.00	
37.5	10,958	0.0000	1.0000	100.00	
38.5	7,775	0.0000	1.0000	100.00	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 352.00 WELLS

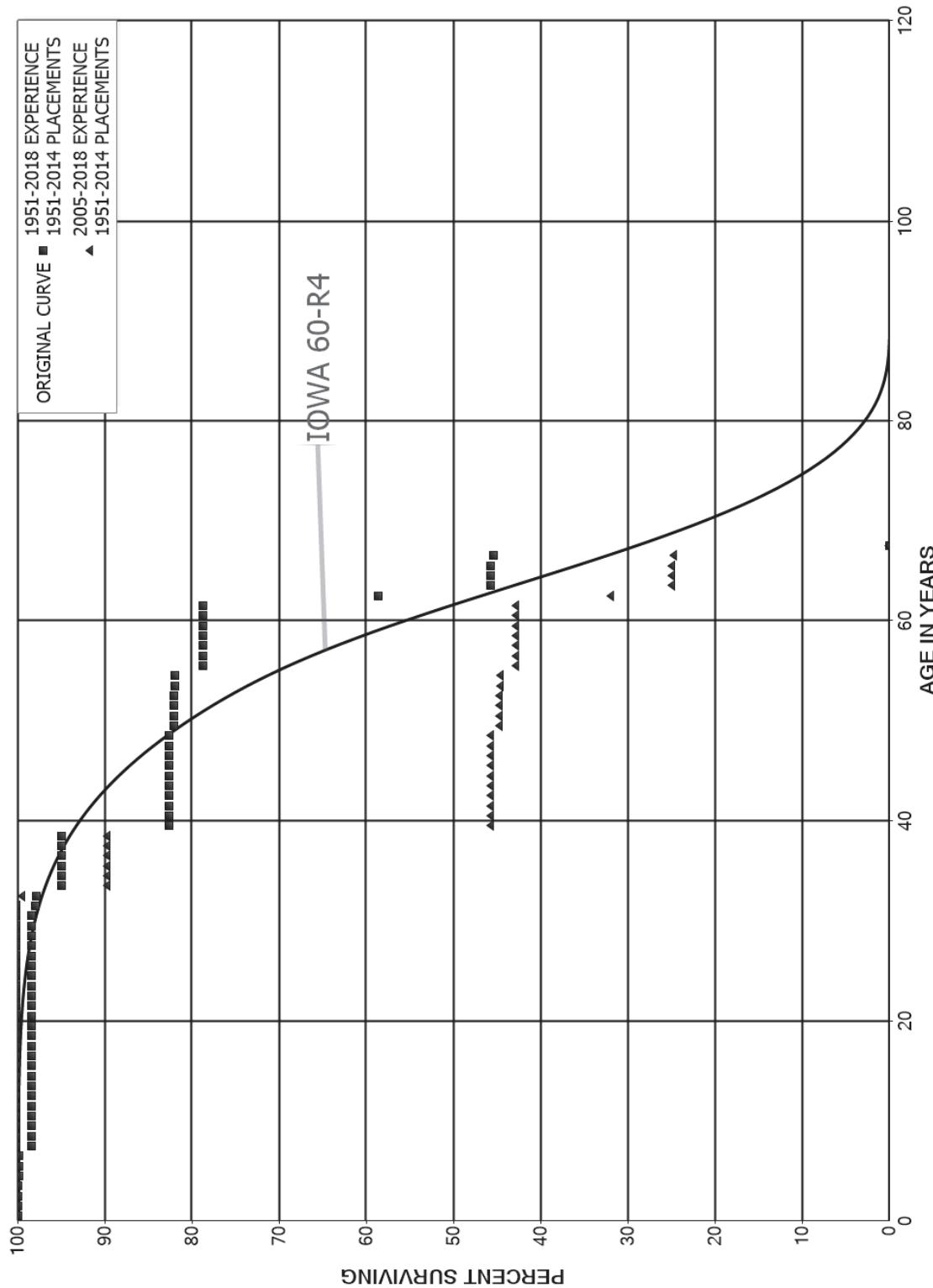
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2016

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	7,775		0.0000	1.0000	100.00
40.5	7,775		0.0000	1.0000	100.00
41.5	10,263		0.0000	1.0000	100.00
42.5	10,263		0.0000	1.0000	100.00
43.5	10,263		0.0000	1.0000	100.00
44.5	13,706		0.0000	1.0000	100.00
45.5	13,712		0.0000	1.0000	100.00
46.5	16,229		0.0000	1.0000	100.00
47.5	18,651		0.0000	1.0000	100.00
48.5	20,648		0.0000	1.0000	100.00
49.5	24,153		0.0000	1.0000	100.00
50.5	22,994		0.0000	1.0000	100.00
51.5	30,058		0.0000	1.0000	100.00
52.5	35,818		0.0000	1.0000	100.00
53.5	72,886		0.0000	1.0000	100.00
54.5	72,886		0.0000	1.0000	100.00
55.5	70,399		0.0000	1.0000	100.00
56.5	70,399		0.0000	1.0000	100.00
57.5	70,399		0.0000	1.0000	100.00
58.5	66,955		0.0000	1.0000	100.00
59.5	66,950	629	0.0094	0.9906	100.00
60.5	64,433	486	0.0075	0.9925	99.06
61.5	62,005		0.0000	1.0000	98.31
62.5	60,008	1,168	0.0195	0.9805	98.31
63.5	56,503	1,524	0.0270	0.9730	96.40
64.5	50,914	2,064	0.0405	0.9595	93.80
65.5	43,346	1,794	0.0414	0.9586	90.00
66.5	37,068	11,282	0.3043	0.6957	86.27
67.5					60.02

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 353.00 PIPELINES
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 353.00 PIPELINES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2014

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	1,162,242		0.0000	1.0000	100.00
0.5	1,162,242		0.0000	1.0000	100.00
1.5	1,162,242	259	0.0002	0.9998	100.00
2.5	1,217,572	56	0.0000	1.0000	99.98
3.5	1,217,515	1,738	0.0014	0.9986	99.97
4.5	1,173,673	51	0.0000	1.0000	99.83
5.5	1,173,622		0.0000	1.0000	99.83
6.5	1,173,622	17,053	0.0145	0.9855	99.83
7.5	1,146,133		0.0000	1.0000	98.38
8.5	1,090,545		0.0000	1.0000	98.38
9.5	1,090,545		0.0000	1.0000	98.38
10.5	1,090,545		0.0000	1.0000	98.38
11.5	1,090,545		0.0000	1.0000	98.38
12.5	1,090,545		0.0000	1.0000	98.38
13.5	1,090,545		0.0000	1.0000	98.38
14.5	1,090,545		0.0000	1.0000	98.38
15.5	1,090,545		0.0000	1.0000	98.38
16.5	1,043,959		0.0000	1.0000	98.38
17.5	974,428		0.0000	1.0000	98.38
18.5	974,428		0.0000	1.0000	98.38
19.5	974,428		0.0000	1.0000	98.38
20.5	974,428		0.0000	1.0000	98.38
21.5	965,718		0.0000	1.0000	98.38
22.5	907,463	108	0.0001	0.9999	98.38
23.5	907,355		0.0000	1.0000	98.36
24.5	907,355		0.0000	1.0000	98.36
25.5	690,494		0.0000	1.0000	98.36
26.5	690,494		0.0000	1.0000	98.36
27.5	690,494		0.0000	1.0000	98.36
28.5	119,288	7	0.0001	0.9999	98.36
29.5	48,821		0.0000	1.0000	98.36
30.5	48,821	200	0.0041	0.9959	98.36
31.5	48,478	80	0.0016	0.9984	97.95
32.5	48,239	1,394	0.0289	0.9711	97.79
33.5	46,148		0.0000	1.0000	94.97
34.5	46,148	2	0.0000	1.0000	94.97
35.5	46,145		0.0000	1.0000	94.96
36.5	46,145		0.0000	1.0000	94.96
37.5	46,145		0.0000	1.0000	94.96
38.5	46,145	6,016	0.1304	0.8696	94.96

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 353.00 PIPELINES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2014

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	34,114		0.0000	1.0000	82.58
40.5	34,114		0.0000	1.0000	82.58
41.5	34,114		0.0000	1.0000	82.58
42.5	34,114		0.0000	1.0000	82.58
43.5	34,114		0.0000	1.0000	82.58
44.5	34,114		0.0000	1.0000	82.58
45.5	34,114		0.0000	1.0000	82.58
46.5	34,114		0.0000	1.0000	82.58
47.5	34,114		0.0000	1.0000	82.58
48.5	34,114	211	0.0062	0.9938	82.58
49.5	33,903		0.0000	1.0000	82.07
50.5	33,903		0.0000	1.0000	82.07
51.5	33,903		0.0000	1.0000	82.07
52.5	33,903	31	0.0009	0.9991	82.07
53.5	33,872		0.0000	1.0000	82.00
54.5	33,872	1,354	0.0400	0.9600	82.00
55.5	32,518		0.0000	1.0000	78.72
56.5	32,518		0.0000	1.0000	78.72
57.5	32,518		0.0000	1.0000	78.72
58.5	32,518		0.0000	1.0000	78.72
59.5	32,518		0.0000	1.0000	78.72
60.5	32,518		0.0000	1.0000	78.72
61.5	32,518	8,284	0.2547	0.7453	78.72
62.5	24,234	5,325	0.2197	0.7803	58.67
63.5	18,910		0.0000	1.0000	45.78
64.5	18,910		0.0000	1.0000	45.78
65.5	18,910	177	0.0094	0.9906	45.78
66.5	18,732	18,732	1.0000		45.35
67.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 353.00 PIPELINES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2014

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	52,541	0.0000	1.0000	100.00	
0.5	52,541	0.0000	1.0000	100.00	
1.5	52,541	0.0000	1.0000	100.00	
2.5	154,715	0.0000	1.0000	100.00	
3.5	224,246	0.0000	1.0000	100.00	
4.5	182,142	0.0000	1.0000	100.00	
5.5	182,142	0.0000	1.0000	100.00	
6.5	182,142	0.0000	1.0000	100.00	
7.5	180,415	0.0000	1.0000	100.00	
8.5	183,082	0.0000	1.0000	100.00	
9.5	183,082	0.0000	1.0000	100.00	
10.5	183,082	0.0000	1.0000	100.00	
11.5	399,943	0.0000	1.0000	100.00	
12.5	399,943	0.0000	1.0000	100.00	
13.5	399,943	0.0000	1.0000	100.00	
14.5	971,149	0.0000	1.0000	100.00	
15.5	1,041,609	0.0000	1.0000	100.00	
16.5	995,023	0.0000	1.0000	100.00	
17.5	925,634	0.0000	1.0000	100.00	
18.5	925,873	0.0000	1.0000	100.00	
19.5	927,964	0.0000	1.0000	100.00	
20.5	927,964	0.0000	1.0000	100.00	
21.5	919,258	0.0000	1.0000	100.00	
22.5	861,002	0.0000	1.0000	100.00	
23.5	861,002	0.0000	1.0000	100.00	
24.5	861,002	0.0000	1.0000	100.00	
25.5	656,173	0.0000	1.0000	100.00	
26.5	656,173	0.0000	1.0000	100.00	
27.5	656,173	0.0000	1.0000	100.00	
28.5	84,967	0.0000	1.0000	100.00	
29.5	14,507	0.0000	1.0000	100.00	
30.5	14,507	0.0000	1.0000	100.00	
31.5	14,364	80	0.0055	0.9945	100.00
32.5	14,125	1,394	0.0987	0.9013	99.45
33.5	12,035		0.0000	1.0000	89.63
34.5	12,035	2	0.0001	0.9999	89.63
35.5	12,242		0.0000	1.0000	89.62
36.5	12,242		0.0000	1.0000	89.62
37.5	12,242		0.0000	1.0000	89.62
38.5	12,242	6,016	0.4914	0.5086	89.62

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 353.00 PIPELINES

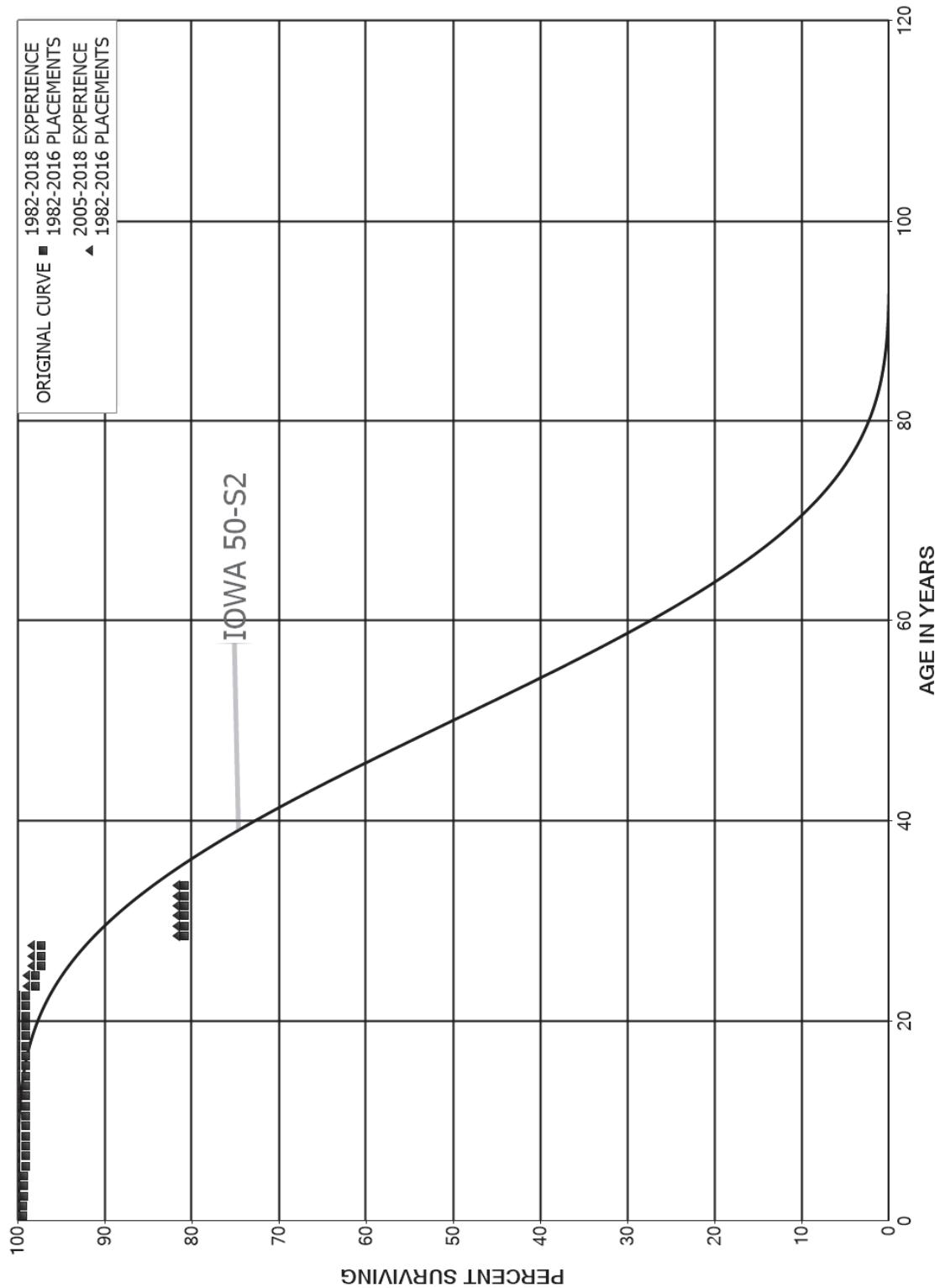
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2014

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	242		0.0000	1.0000	45.58
40.5	242		0.0000	1.0000	45.58
41.5	1,596		0.0000	1.0000	45.58
42.5	1,596		0.0000	1.0000	45.58
43.5	1,596		0.0000	1.0000	45.58
44.5	1,596		0.0000	1.0000	45.58
45.5	1,596		0.0000	1.0000	45.58
46.5	1,596		0.0000	1.0000	45.58
47.5	1,596		0.0000	1.0000	45.58
48.5	9,880	211	0.0214	0.9786	45.58
49.5	14,993		0.0000	1.0000	44.61
50.5	14,993		0.0000	1.0000	44.61
51.5	14,993		0.0000	1.0000	44.61
52.5	15,170	31	0.0020	0.9980	44.61
53.5	33,872		0.0000	1.0000	44.52
54.5	33,872	1,354	0.0400	0.9600	44.52
55.5	32,518		0.0000	1.0000	42.74
56.5	32,518		0.0000	1.0000	42.74
57.5	32,518		0.0000	1.0000	42.74
58.5	32,518		0.0000	1.0000	42.74
59.5	32,518		0.0000	1.0000	42.74
60.5	32,518		0.0000	1.0000	42.74
61.5	32,518	8,284	0.2547	0.7453	42.74
62.5	24,234	5,325	0.2197	0.7803	31.85
63.5	18,910		0.0000	1.0000	24.85
64.5	18,910		0.0000	1.0000	24.85
65.5	18,910	177	0.0094	0.9906	24.85
66.5	18,732	18,732	1.0000		24.62
67.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 354.00 COMPRESSOR STATION EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 354.00 COMPRESSOR STATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1982-2016			EXPERIENCE BAND 1982-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	2,774,050	15,322	0.0055	0.9945	100.00
0.5	2,758,728	2,040	0.0007	0.9993	99.45
1.5	2,756,687	3,200	0.0012	0.9988	99.37
2.5	2,593,720		0.0000	1.0000	99.26
3.5	2,462,321		0.0000	1.0000	99.26
4.5	2,462,321	5,293	0.0021	0.9979	99.26
5.5	2,433,778		0.0000	1.0000	99.05
6.5	2,273,547		0.0000	1.0000	99.05
7.5	2,273,547		0.0000	1.0000	99.05
8.5	2,273,547		0.0000	1.0000	99.05
9.5	2,273,547		0.0000	1.0000	99.05
10.5	2,273,547		0.0000	1.0000	99.05
11.5	2,273,547		0.0000	1.0000	99.05
12.5	2,273,547		0.0000	1.0000	99.05
13.5	2,273,547		0.0000	1.0000	99.05
14.5	1,236,110		0.0000	1.0000	99.05
15.5	1,236,110		0.0000	1.0000	99.05
16.5	1,236,110		0.0000	1.0000	99.05
17.5	1,236,110		0.0000	1.0000	99.05
18.5	1,236,110		0.0000	1.0000	99.05
19.5	1,236,110		0.0000	1.0000	99.05
20.5	1,236,110		0.0000	1.0000	99.05
21.5	1,236,110		0.0000	1.0000	99.05
22.5	1,236,110	14,118	0.0114	0.9886	99.05
23.5	1,221,992		0.0000	1.0000	97.91
24.5	1,221,992	7,556	0.0062	0.9938	97.91
25.5	918,935		0.0000	1.0000	97.31
26.5	918,935		0.0000	1.0000	97.31
27.5	918,935	155,807	0.1696	0.8304	97.31
28.5	763,128		0.0000	1.0000	80.81
29.5	681,367		0.0000	1.0000	80.81
30.5	681,367		0.0000	1.0000	80.81
31.5	680,151		0.0000	1.0000	80.81
32.5	628,333		0.0000	1.0000	80.81
33.5	5,103		0.0000	1.0000	80.81
34.5	5,103		0.0000	1.0000	80.81
35.5	5,103		0.0000	1.0000	80.81
36.5					80.81

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 354.00 COMPRESSOR STATION EQUIPMENT

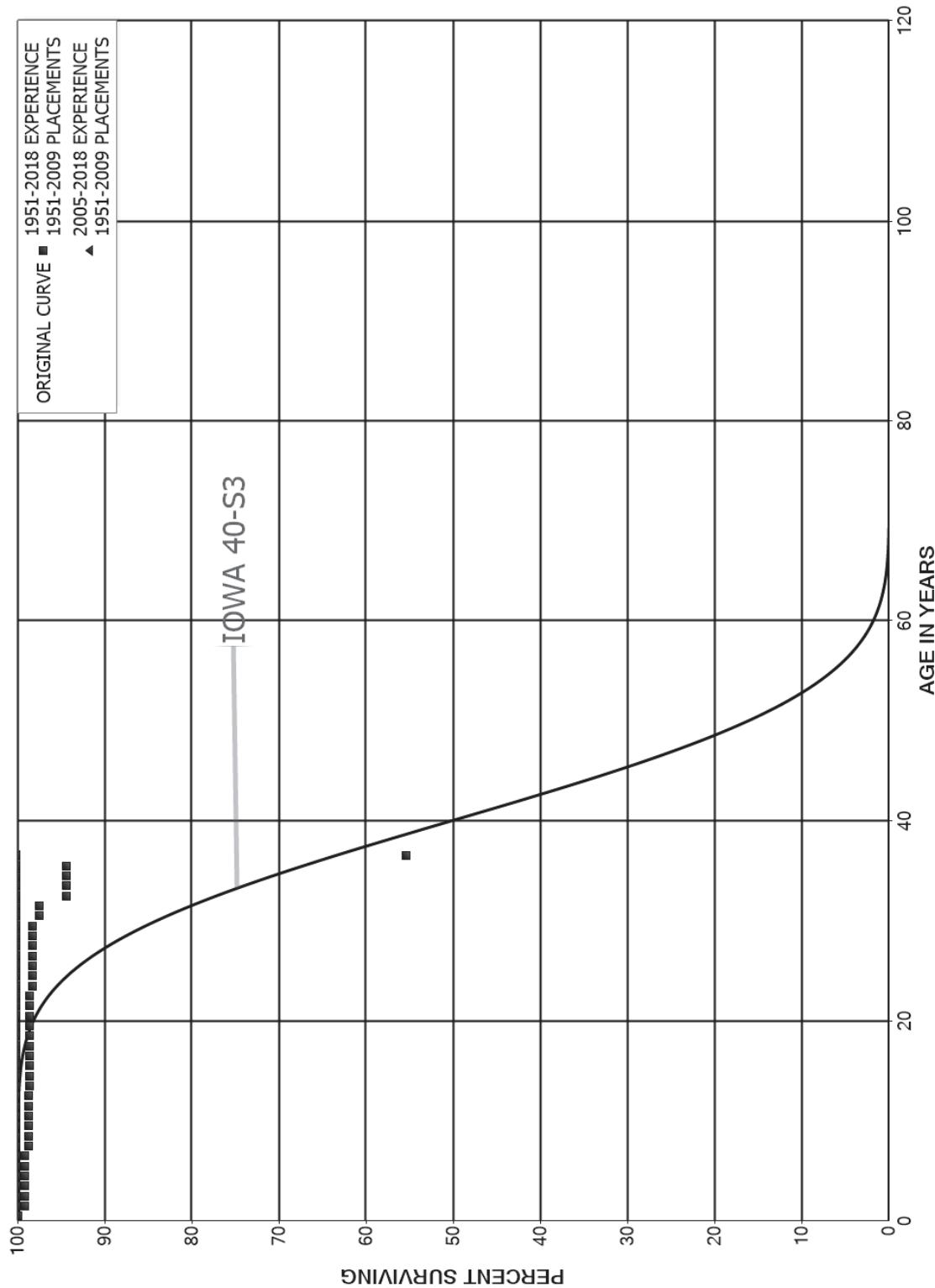
ORIGINAL LIFE TABLE

PLACEMENT BAND 1982-2016

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	474,647		0.0000	1.0000	100.00
0.5	1,512,084		0.0000	1.0000	100.00
1.5	1,512,084		0.0000	1.0000	100.00
2.5	1,352,317		0.0000	1.0000	100.00
3.5	1,220,918		0.0000	1.0000	100.00
4.5	1,220,918		0.0000	1.0000	100.00
5.5	1,197,668		0.0000	1.0000	100.00
6.5	1,037,437		0.0000	1.0000	100.00
7.5	1,037,437		0.0000	1.0000	100.00
8.5	1,037,437		0.0000	1.0000	100.00
9.5	1,037,437		0.0000	1.0000	100.00
10.5	1,037,437		0.0000	1.0000	100.00
11.5	1,332,939		0.0000	1.0000	100.00
12.5	1,332,939		0.0000	1.0000	100.00
13.5	1,332,939		0.0000	1.0000	100.00
14.5	295,502		0.0000	1.0000	100.00
15.5	377,262		0.0000	1.0000	100.00
16.5	377,262		0.0000	1.0000	100.00
17.5	386,034		0.0000	1.0000	100.00
18.5	451,969		0.0000	1.0000	100.00
19.5	1,231,007		0.0000	1.0000	100.00
20.5	1,231,007		0.0000	1.0000	100.00
21.5	1,231,007		0.0000	1.0000	100.00
22.5	1,236,110	14,118	0.0114	0.9886	100.00
23.5	1,221,992		0.0000	1.0000	98.86
24.5	1,221,992	7,556	0.0062	0.9938	98.86
25.5	918,935		0.0000	1.0000	98.25
26.5	918,935		0.0000	1.0000	98.25
27.5	918,935	155,807	0.1696	0.8304	98.25
28.5	763,128		0.0000	1.0000	81.59
29.5	681,367		0.0000	1.0000	81.59
30.5	681,367		0.0000	1.0000	81.59
31.5	680,151		0.0000	1.0000	81.59
32.5	628,333		0.0000	1.0000	81.59
33.5	5,103		0.0000	1.0000	81.59
34.5	5,103		0.0000	1.0000	81.59
35.5	5,103		0.0000	1.0000	81.59
36.5					81.59

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 355.00 MEASURING AND REGULATING EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 355.00 MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2009			EXPERIENCE BAND 1951-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	231,413	29	0.0001	0.9999	100.00
0.5	231,384	1,772	0.0077	0.9923	99.99
1.5	229,613	37	0.0002	0.9998	99.22
2.5	229,576		0.0000	1.0000	99.21
3.5	229,576		0.0000	1.0000	99.21
4.5	229,576		0.0000	1.0000	99.21
5.5	229,576		0.0000	1.0000	99.21
6.5	229,576	1,203	0.0052	0.9948	99.21
7.5	228,372		0.0000	1.0000	98.69
8.5	228,372		0.0000	1.0000	98.69
9.5	211,690		0.0000	1.0000	98.69
10.5	211,690		0.0000	1.0000	98.69
11.5	211,690		0.0000	1.0000	98.69
12.5	211,690	148	0.0007	0.9993	98.69
13.5	211,542		0.0000	1.0000	98.62
14.5	211,542		0.0000	1.0000	98.62
15.5	206,760		0.0000	1.0000	98.62
16.5	206,760		0.0000	1.0000	98.62
17.5	206,052	64	0.0003	0.9997	98.62
18.5	151,919		0.0000	1.0000	98.59
19.5	150,005		0.0000	1.0000	98.59
20.5	150,005		0.0000	1.0000	98.59
21.5	150,005		0.0000	1.0000	98.59
22.5	150,005	505	0.0034	0.9966	98.59
23.5	149,500		0.0000	1.0000	98.25
24.5	111,080		0.0000	1.0000	98.25
25.5	86,605		0.0000	1.0000	98.25
26.5	85,889		0.0000	1.0000	98.25
27.5	85,889		0.0000	1.0000	98.25
28.5	85,889		0.0000	1.0000	98.25
29.5	52,610	412	0.0078	0.9922	98.25
30.5	25,940		0.0000	1.0000	97.49
31.5	25,940	826	0.0319	0.9681	97.49
32.5	25,113		0.0000	1.0000	94.38
33.5	13,561		0.0000	1.0000	94.38
34.5	13,561		0.0000	1.0000	94.38
35.5	13,553	5,603	0.4134	0.5866	94.38
36.5	7,951		0.0000	1.0000	55.36
37.5	7,951		0.0000	1.0000	55.36
38.5	7,951		0.0000	1.0000	55.36

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 355.00 MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2009			EXPERIENCE BAND 1951-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	7,891		0.0000	1.0000	55.36
40.5	7,822		0.0000	1.0000	55.36
41.5	7,822		0.0000	1.0000	55.36
42.5	7,822		0.0000	1.0000	55.36
43.5	7,822		0.0000	1.0000	55.36
44.5	7,822	803	0.1027	0.8973	55.36
45.5	6,963		0.0000	1.0000	49.68
46.5	6,963		0.0000	1.0000	49.68
47.5	6,963		0.0000	1.0000	49.68
48.5	6,963		0.0000	1.0000	49.68
49.5	6,493		0.0000	1.0000	49.68
50.5	6,493		0.0000	1.0000	49.68
51.5	6,493		0.0000	1.0000	49.68
52.5	6,493		0.0000	1.0000	49.68
53.5	6,493		0.0000	1.0000	49.68
54.5	6,493		0.0000	1.0000	49.68
55.5	6,493		0.0000	1.0000	49.68
56.5	6,493		0.0000	1.0000	49.68
57.5	6,493		0.0000	1.0000	49.68
58.5	6,360		0.0000	1.0000	49.68
59.5	6,360		0.0000	1.0000	49.68
60.5	6,360		0.0000	1.0000	49.68
61.5	6,360		0.0000	1.0000	49.68
62.5	6,360		0.0000	1.0000	49.68
63.5	5,105		0.0000	1.0000	49.68
64.5	5,105		0.0000	1.0000	49.68
65.5	5,105		0.0000	1.0000	49.68
66.5	5,105		0.0000	1.0000	49.68
67.5					49.68

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 355.00 MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2009			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	16,682	0.0000	1.0000	100.00	
0.5	16,682	0.0000	1.0000	100.00	
1.5	21,464	0.0000	1.0000	100.00	
2.5	21,464	0.0000	1.0000	100.00	
3.5	22,172	0.0000	1.0000	100.00	
4.5	76,241	0.0000	1.0000	100.00	
5.5	78,155	0.0000	1.0000	100.00	
6.5	78,155	0.0000	1.0000	100.00	
7.5	78,155	0.0000	1.0000	100.00	
8.5	78,155	0.0000	1.0000	100.00	
9.5	61,473	0.0000	1.0000	100.00	
10.5	99,893	0.0000	1.0000	100.00	
11.5	124,368	0.0000	1.0000	100.00	
12.5	125,084	0.0000	1.0000	100.00	
13.5	125,084	0.0000	1.0000	100.00	
14.5	125,084	0.0000	1.0000	100.00	
15.5	153,581	0.0000	1.0000	100.00	
16.5	179,839	0.0000	1.0000	100.00	
17.5	179,132	0.0000	1.0000	100.00	
18.5	125,062	0.0000	1.0000	100.00	
19.5	134,701	0.0000	1.0000	100.00	
20.5	134,701	0.0000	1.0000	100.00	
21.5	134,709	0.0000	1.0000	100.00	
22.5	134,709	0.0000	1.0000	100.00	
23.5	134,709	0.0000	1.0000	100.00	
24.5	96,288	0.0000	1.0000	100.00	
25.5	71,873	0.0000	1.0000	100.00	
26.5	71,226	0.0000	1.0000	100.00	
27.5	71,226	0.0000	1.0000	100.00	
28.5	71,226	0.0000	1.0000	100.00	
29.5	37,947	0.0000	1.0000	100.00	
30.5	11,689	0.0000	1.0000	100.00	
31.5	11,744	0.0000	1.0000	100.00	
32.5	11,744	0.0000	1.0000	100.00	
33.5	192	0.0000	1.0000	100.00	
34.5	192	0.0000	1.0000	100.00	
35.5	655	0.0000	1.0000	100.00	
36.5	655	0.0000	1.0000	100.00	
37.5	655	0.0000	1.0000	100.00	
38.5	655	0.0000	1.0000	100.00	

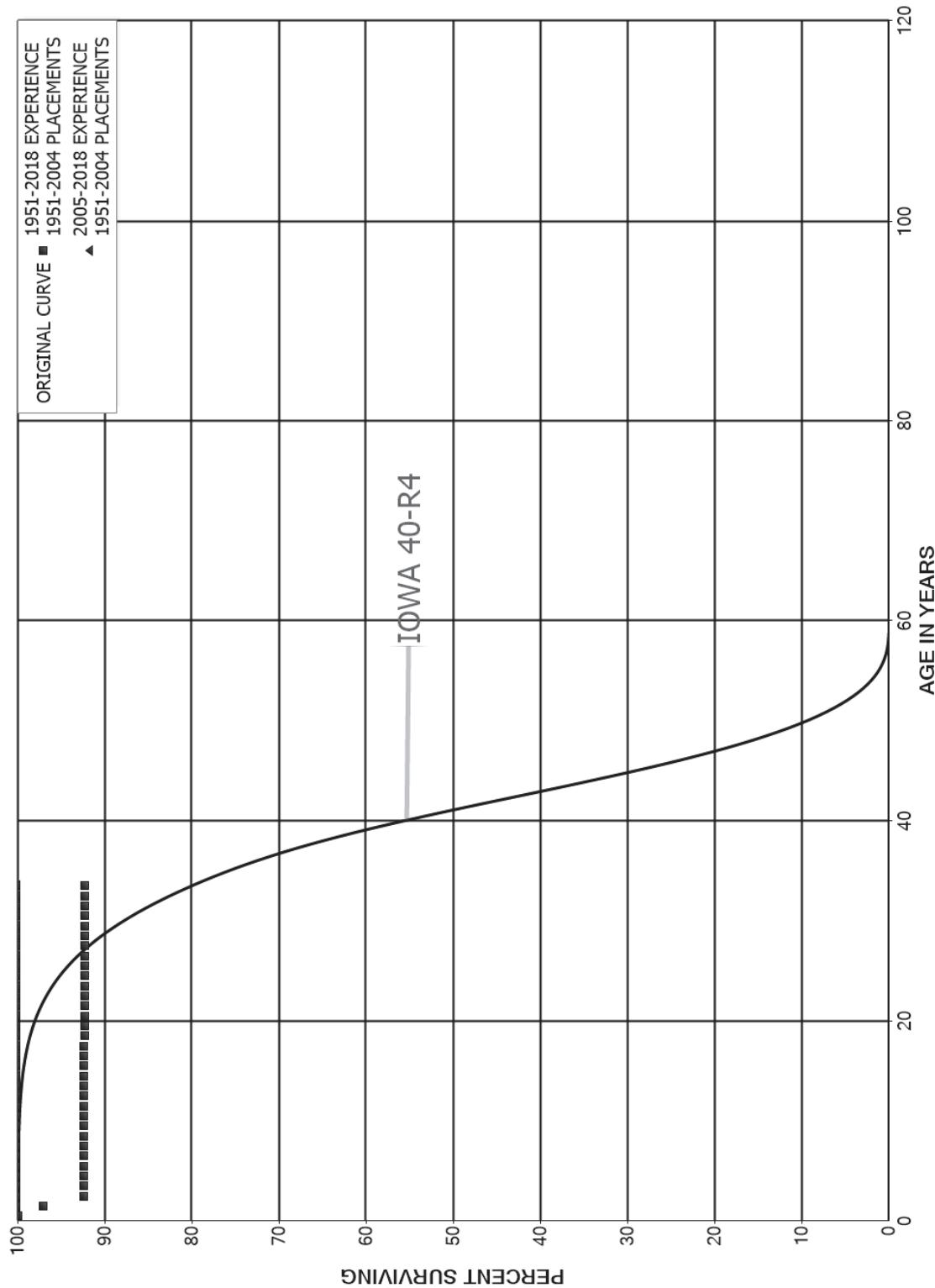
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 355.00 MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2009			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	595	0.0000	1.0000	100.00	
40.5	526	0.0000	1.0000	100.00	
41.5	526	0.0000	1.0000	100.00	
42.5	526	0.0000	1.0000	100.00	
43.5	526	0.0000	1.0000	100.00	
44.5	658	0.0000	1.0000	100.00	
45.5	603	0.0000	1.0000	100.00	
46.5	603	0.0000	1.0000	100.00	
47.5	603	0.0000	1.0000	100.00	
48.5	603	0.0000	1.0000	100.00	
49.5	1,387	0.0000	1.0000	100.00	
50.5	1,387	0.0000	1.0000	100.00	
51.5	1,387	0.0000	1.0000	100.00	
52.5	1,387	0.0000	1.0000	100.00	
53.5	6,493	0.0000	1.0000	100.00	
54.5	6,493	0.0000	1.0000	100.00	
55.5	6,493	0.0000	1.0000	100.00	
56.5	6,493	0.0000	1.0000	100.00	
57.5	6,493	0.0000	1.0000	100.00	
58.5	6,360	0.0000	1.0000	100.00	
59.5	6,360	0.0000	1.0000	100.00	
60.5	6,360	0.0000	1.0000	100.00	
61.5	6,360	0.0000	1.0000	100.00	
62.5	6,360	0.0000	1.0000	100.00	
63.5	5,105	0.0000	1.0000	100.00	
64.5	5,105	0.0000	1.0000	100.00	
65.5	5,105	0.0000	1.0000	100.00	
66.5	5,105	0.0000	1.0000	100.00	
67.5				100.00	

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 356.00 PURIFICATION EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 356.00 PURIFICATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2004

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	312,528		0.0000	1.0000	100.00
0.5	312,528	9,123	0.0292	0.9708	100.00
1.5	303,405	14,543	0.0479	0.9521	97.08
2.5	288,862		0.0000	1.0000	92.43
3.5	288,862		0.0000	1.0000	92.43
4.5	288,862		0.0000	1.0000	92.43
5.5	288,862		0.0000	1.0000	92.43
6.5	288,862		0.0000	1.0000	92.43
7.5	288,862		0.0000	1.0000	92.43
8.5	288,862		0.0000	1.0000	92.43
9.5	288,862		0.0000	1.0000	92.43
10.5	288,862		0.0000	1.0000	92.43
11.5	288,862		0.0000	1.0000	92.43
12.5	288,862		0.0000	1.0000	92.43
13.5	288,862		0.0000	1.0000	92.43
14.5	273,843		0.0000	1.0000	92.43
15.5	273,843		0.0000	1.0000	92.43
16.5	273,843		0.0000	1.0000	92.43
17.5	273,843	480	0.0018	0.9982	92.43
18.5	273,364		0.0000	1.0000	92.27
19.5	273,364		0.0000	1.0000	92.27
20.5	273,364		0.0000	1.0000	92.27
21.5	273,364		0.0000	1.0000	92.27
22.5	273,364		0.0000	1.0000	92.27
23.5	273,364		0.0000	1.0000	92.27
24.5	266,710		0.0000	1.0000	92.27
25.5	202,951		0.0000	1.0000	92.27
26.5	202,951		0.0000	1.0000	92.27
27.5	202,951		0.0000	1.0000	92.27
28.5	202,951		0.0000	1.0000	92.27
29.5	128,282		0.0000	1.0000	92.27
30.5	126,510		0.0000	1.0000	92.27
31.5	126,510		0.0000	1.0000	92.27
32.5	125,527		0.0000	1.0000	92.27
33.5	9,368		0.0000	1.0000	92.27
34.5	9,368		0.0000	1.0000	92.27
35.5	9,368		0.0000	1.0000	92.27
36.5	4,404		0.0000	1.0000	92.27
37.5	4,404		0.0000	1.0000	92.27
38.5	4,404		0.0000	1.0000	92.27

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 356.00 PURIFICATION EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2004

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	4,404	0.0000	1.0000	92.27	
40.5	4,404	0.0000	1.0000	92.27	
41.5	4,404	0.0000	1.0000	92.27	
42.5	4,404	0.0000	1.0000	92.27	
43.5	4,404	0.0000	1.0000	92.27	
44.5	4,404	0.0000	1.0000	92.27	
45.5	4,404	0.0000	1.0000	92.27	
46.5	4,404	0.0000	1.0000	92.27	
47.5	4,404	0.0000	1.0000	92.27	
48.5	4,404	0.0000	1.0000	92.27	
49.5	4,293	0.0000	1.0000	92.27	
50.5	4,293	0.0000	1.0000	92.27	
51.5	4,293	0.0000	1.0000	92.27	
52.5	4,293	0.0000	1.0000	92.27	
53.5	4,293	0.0000	1.0000	92.27	
54.5	4,293	0.0000	1.0000	92.27	
55.5	4,293	0.0000	1.0000	92.27	
56.5	4,293	0.0000	1.0000	92.27	
57.5	4,293	0.0000	1.0000	92.27	
58.5	3,562	0.0000	1.0000	92.27	
59.5	2,128	0.0000	1.0000	92.27	
60.5	2,128	0.0000	1.0000	92.27	
61.5	2,128	0.0000	1.0000	92.27	
62.5	2,128	0.0000	1.0000	92.27	
63.5	2,128	0.0000	1.0000	92.27	
64.5	2,128	0.0000	1.0000	92.27	
65.5	2,128	0.0000	1.0000	92.27	
66.5	2,128	0.0000	1.0000	92.27	
67.5					92.27

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 356.00 PURIFICATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2004

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0					
0.5	15,019	0.0000	1.0000	100.00	
1.5	15,019	0.0000	1.0000	100.00	
2.5	15,019	0.0000	1.0000	100.00	
3.5	15,019	0.0000	1.0000	100.00	
4.5	15,019	0.0000	1.0000	100.00	
5.5	15,019	0.0000	1.0000	100.00	
6.5	15,019	0.0000	1.0000	100.00	
7.5	15,019	0.0000	1.0000	100.00	
8.5	15,019	0.0000	1.0000	100.00	
9.5	15,019	0.0000	1.0000	100.00	
10.5	21,673	0.0000	1.0000	100.00	
11.5	85,432	0.0000	1.0000	100.00	
12.5	85,432	0.0000	1.0000	100.00	
13.5	85,432	0.0000	1.0000	100.00	
14.5	70,413	0.0000	1.0000	100.00	
15.5	145,082	0.0000	1.0000	100.00	
16.5	146,853	0.0000	1.0000	100.00	
17.5	146,853	0.0000	1.0000	100.00	
18.5	147,837	0.0000	1.0000	100.00	
19.5	263,995	0.0000	1.0000	100.00	
20.5	263,995	0.0000	1.0000	100.00	
21.5	263,995	0.0000	1.0000	100.00	
22.5	268,959	0.0000	1.0000	100.00	
23.5	268,959	0.0000	1.0000	100.00	
24.5	262,306	0.0000	1.0000	100.00	
25.5	198,547	0.0000	1.0000	100.00	
26.5	198,547	0.0000	1.0000	100.00	
27.5	198,547	0.0000	1.0000	100.00	
28.5	198,547	0.0000	1.0000	100.00	
29.5	123,878	0.0000	1.0000	100.00	
30.5	122,106	0.0000	1.0000	100.00	
31.5	122,106	0.0000	1.0000	100.00	
32.5	121,123	0.0000	1.0000	100.00	
33.5	4,964	0.0000	1.0000	100.00	
34.5	4,964	0.0000	1.0000	100.00	
35.5	5,075	0.0000	1.0000	100.00	
36.5	111	0.0000	1.0000	100.00	
37.5	111	0.0000	1.0000	100.00	
38.5	111	0.0000	1.0000	100.00	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 356.00 PURIFICATION EQUIPMENT

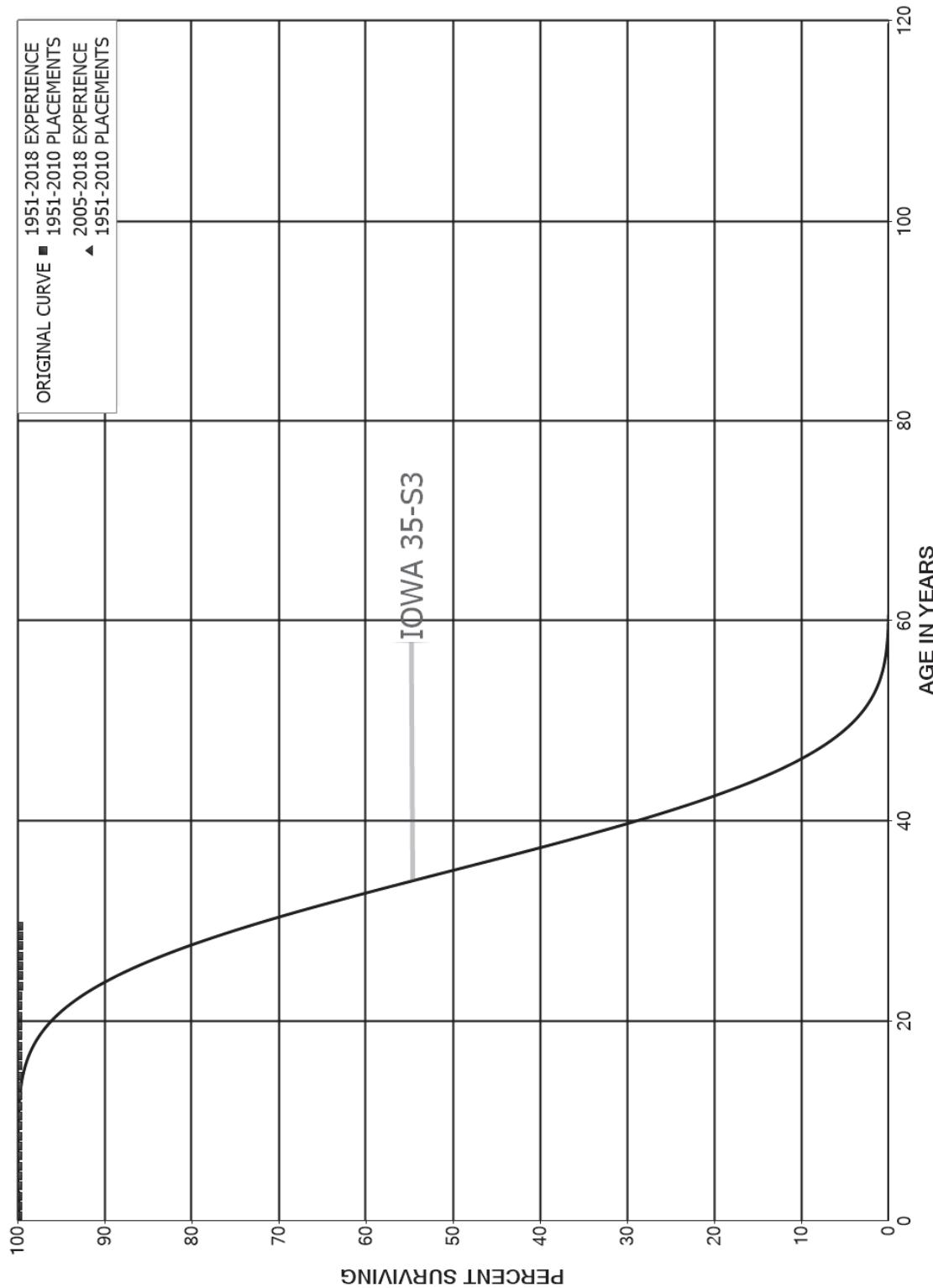
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2004

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	111	0.0000	1.0000	100.00	
40.5	111	0.0000	1.0000	100.00	
41.5	111	0.0000	1.0000	100.00	
42.5	111	0.0000	1.0000	100.00	
43.5	111	0.0000	1.0000	100.00	
44.5	842	0.0000	1.0000	100.00	
45.5	2,276	0.0000	1.0000	100.00	
46.5	2,276	0.0000	1.0000	100.00	
47.5	2,276	0.0000	1.0000	100.00	
48.5	2,276	0.0000	1.0000	100.00	
49.5	2,165	0.0000	1.0000	100.00	
50.5	2,165	0.0000	1.0000	100.00	
51.5	2,165	0.0000	1.0000	100.00	
52.5	2,165	0.0000	1.0000	100.00	
53.5	4,293	0.0000	1.0000	100.00	
54.5	4,293	0.0000	1.0000	100.00	
55.5	4,293	0.0000	1.0000	100.00	
56.5	4,293	0.0000	1.0000	100.00	
57.5	4,293	0.0000	1.0000	100.00	
58.5	3,562	0.0000	1.0000	100.00	
59.5	2,128	0.0000	1.0000	100.00	
60.5	2,128	0.0000	1.0000	100.00	
61.5	2,128	0.0000	1.0000	100.00	
62.5	2,128	0.0000	1.0000	100.00	
63.5	2,128	0.0000	1.0000	100.00	
64.5	2,128	0.0000	1.0000	100.00	
65.5	2,128	0.0000	1.0000	100.00	
66.5	2,128	0.0000	1.0000	100.00	
67.5					100.00

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 357.00 OTHER EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 357.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2010			EXPERIENCE BAND 1951-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	167,657		0.0000	1.0000	100.00
0.5	167,657		0.0000	1.0000	100.00
1.5	167,657		0.0000	1.0000	100.00
2.5	125,466		0.0000	1.0000	100.00
3.5	125,466		0.0000	1.0000	100.00
4.5	125,466		0.0000	1.0000	100.00
5.5	125,466		0.0000	1.0000	100.00
6.5	125,466	7	0.0001	0.9999	100.00
7.5	125,459		0.0000	1.0000	99.99
8.5	125,459		0.0000	1.0000	99.99
9.5	125,459		0.0000	1.0000	99.99
10.5	125,459	69	0.0006	0.9994	99.99
11.5	125,390		0.0000	1.0000	99.94
12.5	125,390		0.0000	1.0000	99.94
13.5	125,390		0.0000	1.0000	99.94
14.5	125,390		0.0000	1.0000	99.94
15.5	125,390		0.0000	1.0000	99.94
16.5	125,390		0.0000	1.0000	99.94
17.5	125,390		0.0000	1.0000	99.94
18.5	125,390		0.0000	1.0000	99.94
19.5	125,390		0.0000	1.0000	99.94
20.5	125,390		0.0000	1.0000	99.94
21.5	125,390		0.0000	1.0000	99.94
22.5	125,390	69	0.0006	0.9994	99.94
23.5	125,321		0.0000	1.0000	99.88
24.5	125,321		0.0000	1.0000	99.88
25.5	97,591		0.0000	1.0000	99.88
26.5	85,740		0.0000	1.0000	99.88
27.5	85,740		0.0000	1.0000	99.88
28.5	20,671		0.0000	1.0000	99.88
29.5	9,945		0.0000	1.0000	99.88
30.5	9,945		0.0000	1.0000	99.88
31.5	9,945		0.0000	1.0000	99.88
32.5	6,085		0.0000	1.0000	99.88
33.5	6,085		0.0000	1.0000	99.88
34.5	6,069		0.0000	1.0000	99.88
35.5	6,069		0.0000	1.0000	99.88
36.5	6,069		0.0000	1.0000	99.88
37.5	6,069		0.0000	1.0000	99.88
38.5	6,069		0.0000	1.0000	99.88

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 357.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2010

EXPERIENCE BAND 1951-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	6,069	0.0000	1.0000	99.88	
40.5	6,069	0.0000	1.0000	99.88	
41.5	6,069	0.0000	1.0000	99.88	
42.5	6,069	0.0000	1.0000	99.88	
43.5	6,069	0.0000	1.0000	99.88	
44.5	6,069	0.0000	1.0000	99.88	
45.5	6,069	0.0000	1.0000	99.88	
46.5	6,069	0.0000	1.0000	99.88	
47.5	6,069	0.0000	1.0000	99.88	
48.5	6,069	0.0000	1.0000	99.88	
49.5	956	0.0000	1.0000	99.88	
50.5	956	0.0000	1.0000	99.88	
51.5	956	0.0000	1.0000	99.88	
52.5	956	0.0000	1.0000	99.88	
53.5	956	0.0000	1.0000	99.88	
54.5	930	0.0000	1.0000	99.88	
55.5	930	0.0000	1.0000	99.88	
56.5	930	0.0000	1.0000	99.88	
57.5	912	0.0000	1.0000	99.88	
58.5	877	0.0000	1.0000	99.88	
59.5	870	0.0000	1.0000	99.88	
60.5	870	0.0000	1.0000	99.88	
61.5	870	0.0000	1.0000	99.88	
62.5	698	0.0000	1.0000	99.88	
63.5	474	0.0000	1.0000	99.88	
64.5	474	0.0000	1.0000	99.88	
65.5	474	0.0000	1.0000	99.88	
66.5	474	0.0000	1.0000	99.88	
67.5				99.88	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 357.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1951-2010		EXPERIENCE BAND 2005-2018			
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	42,191	0.0000	1.0000	100.00	
0.5	42,191	0.0000	1.0000	100.00	
1.5	42,191	0.0000	1.0000	100.00	
2.5				100.00	
3.5					
4.5					
5.5					
6.5					
7.5					
8.5					
9.5					
10.5					
11.5	27,730	0.0000			
12.5	39,582	0.0000			
13.5	39,582	0.0000			
14.5	104,650	0.0000			
15.5	115,376	0.0000			
16.5	115,376	0.0000			
17.5	115,376	0.0000			
18.5	119,236	0.0000			
19.5	119,236	0.0000			
20.5	119,252	0.0000			
21.5	119,252	0.0000			
22.5	119,252	0.0000			
23.5	119,252	0.0000			
24.5	119,252	0.0000			
25.5	91,522	0.0000			
26.5	79,671	0.0000			
27.5	79,671	0.0000			
28.5	14,602	0.0000			
29.5	3,876	0.0000			
30.5	3,876	0.0000			
31.5	3,876	0.0000			
32.5	16	0.0000			
33.5	16	0.0000			
34.5					
35.5	5,113	0.0000			
36.5	5,113	0.0000			
37.5	5,113	0.0000			
38.5	5,113	0.0000			

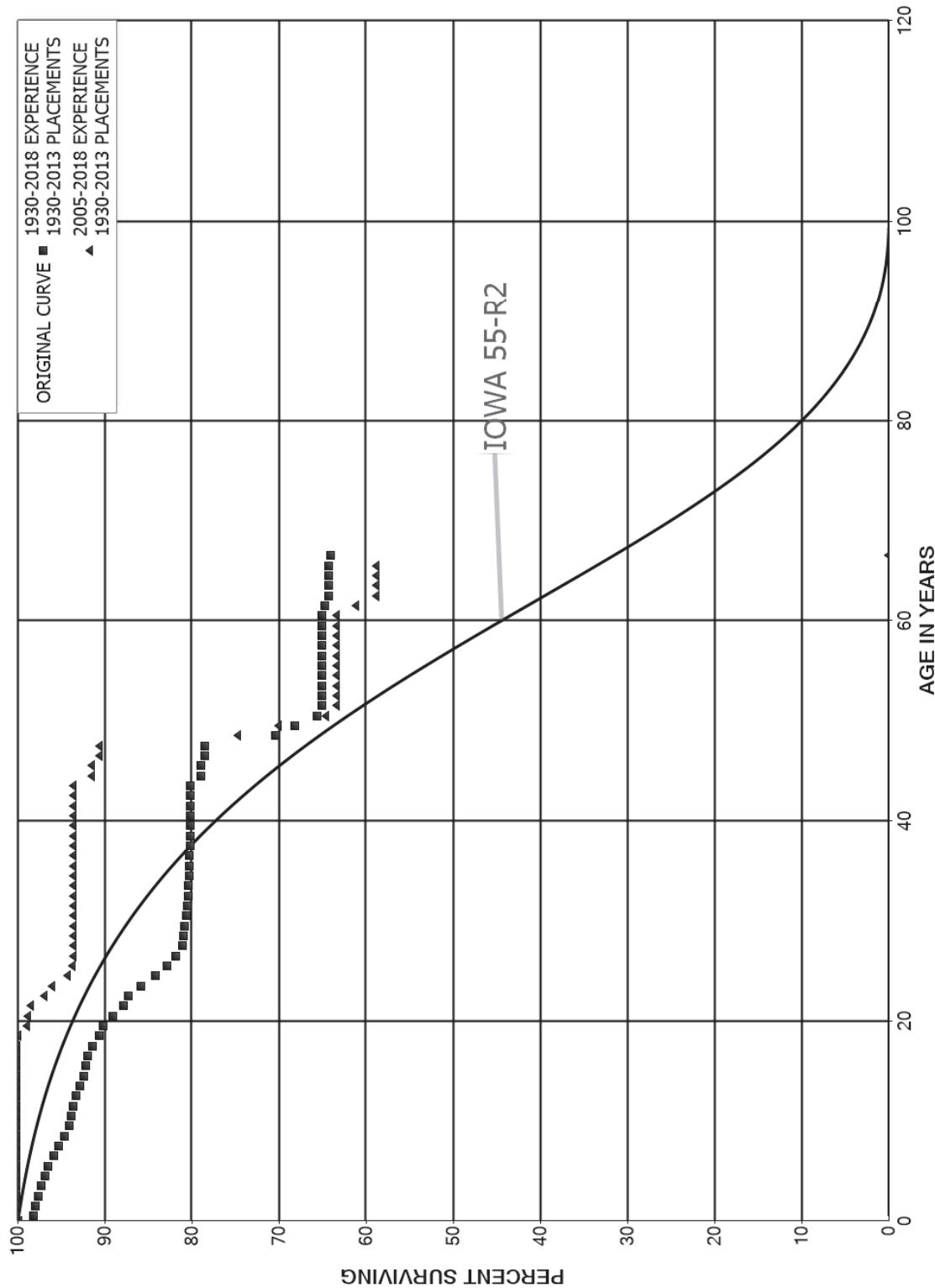
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 357.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1951-2010		EXPERIENCE BAND 2005-2018			
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	5,113		0.0000		
40.5	5,139		0.0000		
41.5	5,139		0.0000		
42.5	5,139		0.0000		
43.5	5,157		0.0000		
44.5	5,192		0.0000		
45.5	5,199		0.0000		
46.5	5,199		0.0000		
47.5	5,199		0.0000		
48.5	5,371		0.0000		
49.5	482		0.0000		
50.5	482		0.0000		
51.5	482		0.0000		
52.5	482		0.0000		
53.5	956		0.0000		
54.5	930		0.0000		
55.5	930		0.0000		
56.5	930		0.0000		
57.5	912		0.0000		
58.5	877		0.0000		
59.5	870		0.0000		
60.5	870		0.0000		
61.5	870		0.0000		
62.5	698		0.0000		
63.5	474		0.0000		
64.5	474		0.0000		
65.5	474		0.0000		
66.5	474		0.0000		
67.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNTS 367.00 AND 367.01 MAINS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1930-2013

EXPERIENCE BAND 1930-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	8,128,329	145,404	0.0179	0.9821	100.00
0.5	7,976,264	19,723	0.0025	0.9975	98.21
1.5	7,891,243	26,791	0.0034	0.9966	97.97
2.5	7,861,619	27,007	0.0034	0.9966	97.64
3.5	7,799,849	34,476	0.0044	0.9956	97.30
4.5	7,708,541	32,015	0.0042	0.9958	96.87
5.5	6,960,170	43,176	0.0062	0.9938	96.47
6.5	6,901,044	42,155	0.0061	0.9939	95.87
7.5	6,736,435	46,893	0.0070	0.9930	95.28
8.5	6,264,298	34,048	0.0054	0.9946	94.62
9.5	6,131,295	20,384	0.0033	0.9967	94.11
10.5	5,983,996	14,341	0.0024	0.9976	93.79
11.5	5,871,916	20,489	0.0035	0.9965	93.57
12.5	5,741,487	24,491	0.0043	0.9957	93.24
13.5	5,593,157	28,642	0.0051	0.9949	92.84
14.5	5,479,426	10,215	0.0019	0.9981	92.37
15.5	5,394,903	17,755	0.0033	0.9967	92.20
16.5	5,284,644	29,930	0.0057	0.9943	91.89
17.5	5,155,769	43,005	0.0083	0.9917	91.37
18.5	4,986,933	22,548	0.0045	0.9955	90.61
19.5	4,869,299	62,020	0.0127	0.9873	90.20
20.5	4,637,132	64,094	0.0138	0.9862	89.05
21.5	4,429,322	26,941	0.0061	0.9939	87.82
22.5	4,318,415	70,312	0.0163	0.9837	87.29
23.5	4,072,207	78,689	0.0193	0.9807	85.87
24.5	3,882,033	63,521	0.0164	0.9836	84.21
25.5	3,669,568	43,479	0.0118	0.9882	82.83
26.5	3,342,774	32,129	0.0096	0.9904	81.85
27.5	2,971,257	4,812	0.0016	0.9984	81.06
28.5	2,592,397	4,348	0.0017	0.9983	80.93
29.5	2,371,134	3,797	0.0016	0.9984	80.79
30.5	2,237,380	3,261	0.0015	0.9985	80.66
31.5	2,176,715	2,686	0.0012	0.9988	80.55
32.5	2,113,368	2,074	0.0010	0.9990	80.45
33.5	2,004,227	1,368	0.0007	0.9993	80.37
34.5	1,958,539	958	0.0005	0.9995	80.31
35.5	1,901,772	649	0.0003	0.9997	80.27
36.5	1,840,175	488	0.0003	0.9997	80.25
37.5	1,772,013	373	0.0002	0.9998	80.23
38.5	1,545,520	260	0.0002	0.9998	80.21

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1930-2013

EXPERIENCE BAND 1930-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	1,521,621	149	0.0001	0.9999	80.20
40.5	1,497,946		0.0000	1.0000	80.19
41.5	1,461,159		0.0000	1.0000	80.19
42.5	1,399,390		0.0000	1.0000	80.19
43.5	1,399,390	22,121	0.0158	0.9842	80.19
44.5	1,095,123		0.0000	1.0000	78.92
45.5	1,074,328	6,369	0.0059	0.9941	78.92
46.5	1,041,872		0.0000	1.0000	78.45
47.5	1,013,751	103,408	0.1020	0.8980	78.45
48.5	877,325	28,518	0.0325	0.9675	70.45
49.5	757,519	27,962	0.0369	0.9631	68.16
50.5	716,980	5,998	0.0084	0.9916	65.64
51.5	697,278		0.0000	1.0000	65.09
52.5	697,278		0.0000	1.0000	65.09
53.5	654,742		0.0000	1.0000	65.09
54.5	563,882		0.0000	1.0000	65.09
55.5	537,060		0.0000	1.0000	65.09
56.5	527,682		0.0000	1.0000	65.09
57.5	423,335		0.0000	1.0000	65.09
58.5	399,304		0.0000	1.0000	65.09
59.5	383,066		0.0000	1.0000	65.09
60.5	383,066	2,352	0.0061	0.9939	65.09
61.5	380,713	2,381	0.0063	0.9937	64.69
62.5	378,332		0.0000	1.0000	64.29
63.5	378,332		0.0000	1.0000	64.29
64.5	323,308		0.0000	1.0000	64.29
65.5	319,841	1,303	0.0041	0.9959	64.29
66.5	318,538		0.0000	1.0000	64.03
67.5	318,538		0.0000	1.0000	64.03
68.5	318,538		0.0000	1.0000	64.03
69.5	318,538		0.0000	1.0000	64.03
70.5	318,538		0.0000	1.0000	64.03
71.5	318,538		0.0000	1.0000	64.03
72.5	318,538		0.0000	1.0000	64.03
73.5	318,538		0.0000	1.0000	64.03
74.5	318,538		0.0000	1.0000	64.03
75.5	318,538		0.0000	1.0000	64.03
76.5	318,538		0.0000	1.0000	64.03
77.5	318,538		0.0000	1.0000	64.03
78.5	318,538		0.0000	1.0000	64.03

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1930-2013

EXPERIENCE BAND 1930-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	318,538		0.0000	1.0000	64.03
80.5	318,538		0.0000	1.0000	64.03
81.5	318,174		0.0000	1.0000	64.03
82.5	318,174	161,934	0.5089	0.4911	64.03
83.5					31.44

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1930-2013

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	120,783		0.0000	1.0000	100.00
0.5	120,118		0.0000	1.0000	100.00
1.5	166,430		0.0000	1.0000	100.00
2.5	166,430		0.0000	1.0000	100.00
3.5	166,430		0.0000	1.0000	100.00
4.5	166,430		0.0000	1.0000	100.00
5.5	166,430		0.0000	1.0000	100.00
6.5	166,430		0.0000	1.0000	100.00
7.5	237,992		0.0000	1.0000	100.00
8.5	209,678		0.0000	1.0000	100.00
9.5	304,505		0.0000	1.0000	100.00
10.5	310,919		0.0000	1.0000	100.00
11.5	479,341	111	0.0002	0.9998	100.00
12.5	751,768		0.0000	1.0000	99.98
13.5	1,028,926		0.0000	1.0000	99.98
14.5	1,392,597		0.0000	1.0000	99.98
15.5	1,548,146	170	0.0001	0.9999	99.98
16.5	1,553,392		0.0000	1.0000	99.97
17.5	1,474,291	2,166	0.0015	0.9985	99.97
18.5	1,472,125	14,256	0.0097	0.9903	99.82
19.5	1,445,847	1,716	0.0012	0.9988	98.85
20.5	1,355,710	5,155	0.0038	0.9962	98.74
21.5	1,318,133	20,079	0.0152	0.9848	98.36
22.5	1,290,990	12,680	0.0098	0.9902	96.86
23.5	1,184,249	21,053	0.0178	0.9822	95.91
24.5	1,182,039	7,401	0.0063	0.9937	94.20
25.5	1,095,607	888	0.0008	0.9992	93.62
26.5	895,341		0.0000	1.0000	93.54
27.5	665,313		0.0000	1.0000	93.54
28.5	393,957		0.0000	1.0000	93.54
29.5	441,926		0.0000	1.0000	93.54
30.5	377,972		0.0000	1.0000	93.54
31.5	389,178		0.0000	1.0000	93.54
32.5	394,139		0.0000	1.0000	93.54
33.5	397,157		0.0000	1.0000	93.54
34.5	396,812		0.0000	1.0000	93.54
35.5	662,611		0.0000	1.0000	93.54
36.5	656,860		0.0000	1.0000	93.54
37.5	647,645		0.0000	1.0000	93.54
38.5	472,283		0.0000	1.0000	93.54

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1930-2013

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	631,786		0.0000	1.0000	93.54
40.5	830,240		0.0000	1.0000	93.54
41.5	848,041		0.0000	1.0000	93.54
42.5	799,977		0.0000	1.0000	93.54
43.5	957,690	22,121	0.0231	0.9769	93.54
44.5	653,424		0.0000	1.0000	91.38
45.5	641,614	6,369	0.0099	0.9901	91.38
46.5	609,159		0.0000	1.0000	90.47
47.5	590,415	103,408	0.1751	0.8249	90.47
48.5	453,990	28,518	0.0628	0.9372	74.63
49.5	358,215	27,962	0.0781	0.9219	69.94
50.5	333,915	5,998	0.0180	0.9820	64.48
51.5	317,679		0.0000	1.0000	63.32
52.5	320,031		0.0000	1.0000	63.32
53.5	279,876		0.0000	1.0000	63.32
54.5	189,017		0.0000	1.0000	63.32
55.5	217,219		0.0000	1.0000	63.32
56.5	207,841		0.0000	1.0000	63.32
57.5	104,798		0.0000	1.0000	63.32
58.5	80,766		0.0000	1.0000	63.32
59.5	64,528		0.0000	1.0000	63.32
60.5	64,528	2,352	0.0365	0.9635	63.32
61.5	62,176	2,381	0.0383	0.9617	61.01
62.5	59,795		0.0000	1.0000	58.68
63.5	59,795		0.0000	1.0000	58.68
64.5	4,770		0.0000	1.0000	58.68
65.5	1,303	1,303	1.0000		58.68
66.5					
67.5					
68.5					
69.5					
70.5					
71.5					
72.5	364		0.0000		
73.5	364		0.0000		
74.5	318,538		0.0000		
75.5	318,538		0.0000		
76.5	318,538		0.0000		
77.5	318,538		0.0000		
78.5	318,538		0.0000		

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

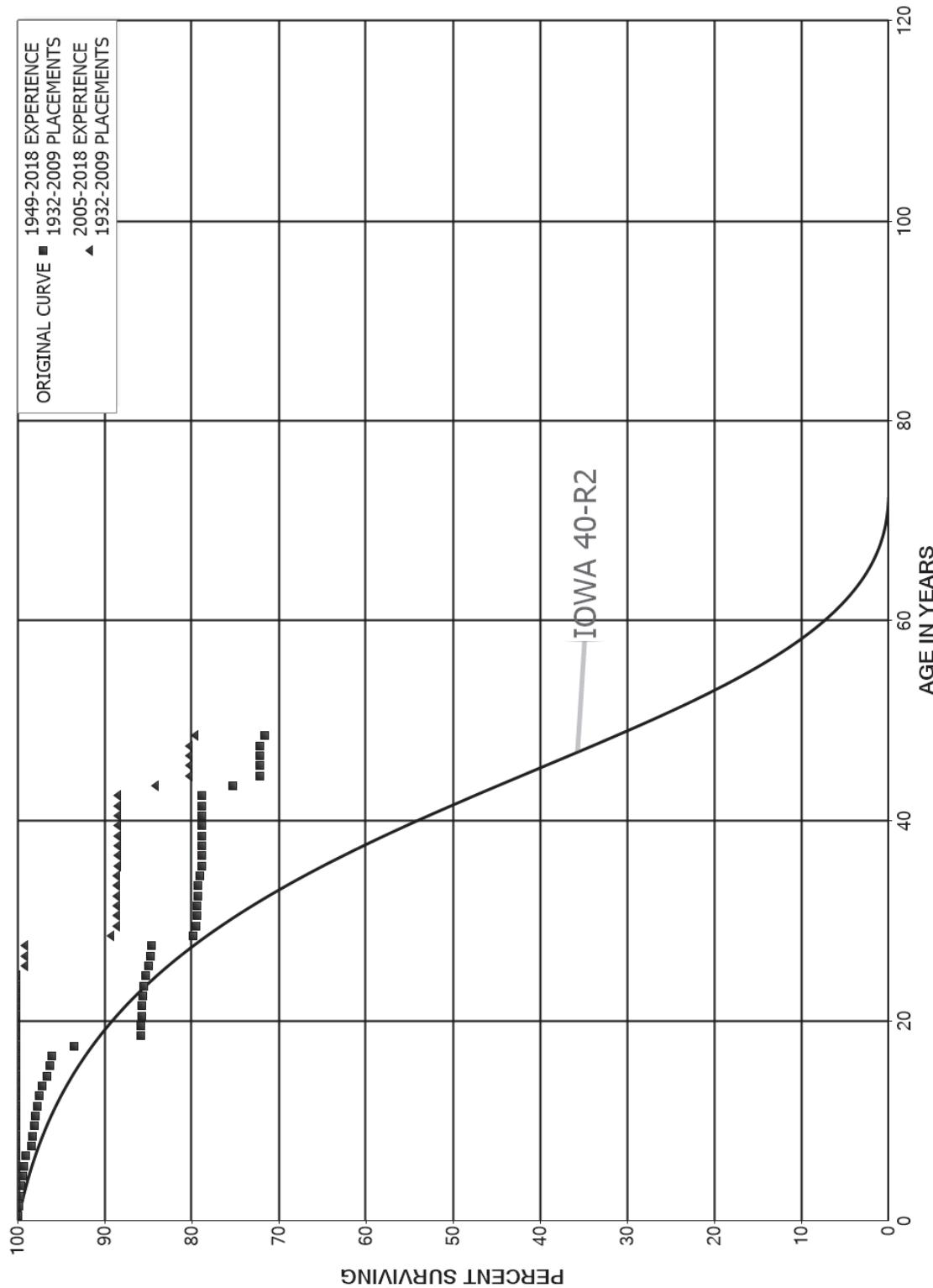
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1930-2013

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	318,538		0.0000		
80.5	318,538		0.0000		
81.5	318,174		0.0000		
82.5	318,174	161,934	0.5089		
83.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1932-2009			EXPERIENCE BAND 1949-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	732,856	239	0.0003	0.9997	100.00
0.5	732,371	687	0.0009	0.9991	99.97
1.5	730,268	781	0.0011	0.9989	99.87
2.5	728,378	1,447	0.0020	0.9980	99.77
3.5	726,416	1,317	0.0018	0.9982	99.57
4.5	724,483	757	0.0010	0.9990	99.39
5.5	673,954	1,599	0.0024	0.9976	99.28
6.5	672,355	4,262	0.0063	0.9937	99.05
7.5	667,936	825	0.0012	0.9988	98.42
8.5	667,111	1,688	0.0025	0.9975	98.30
9.5	633,559	834	0.0013	0.9987	98.05
10.5	532,874	936	0.0018	0.9982	97.92
11.5	527,674	1,371	0.0026	0.9974	97.75
12.5	518,161	1,835	0.0035	0.9965	97.50
13.5	505,843	2,558	0.0051	0.9949	97.15
14.5	501,815	1,912	0.0038	0.9962	96.66
15.5	497,057	1,260	0.0025	0.9975	96.29
16.5	468,956	12,445	0.0265	0.9735	96.05
17.5	456,511	37,199	0.0815	0.9185	93.50
18.5	410,567	239	0.0006	0.9994	85.88
19.5	408,440	283	0.0007	0.9993	85.83
20.5	406,384	249	0.0006	0.9994	85.77
21.5	404,472	460	0.0011	0.9989	85.72
22.5	402,452	622	0.0015	0.9985	85.62
23.5	400,385	832	0.0021	0.9979	85.49
24.5	398,227	1,929	0.0048	0.9952	85.31
25.5	395,084	545	0.0014	0.9986	84.90
26.5	390,995	653	0.0017	0.9983	84.78
27.5	389,330	21,956	0.0564	0.9436	84.64
28.5	361,765	1,796	0.0050	0.9950	79.86
29.5	330,247	135	0.0004	0.9996	79.47
30.5	312,673	93	0.0003	0.9997	79.43
31.5	291,753	273	0.0009	0.9991	79.41
32.5	266,350	80	0.0003	0.9997	79.34
33.5	226,195	745	0.0033	0.9967	79.31
34.5	222,065	700	0.0032	0.9968	79.05
35.5	173,903	14	0.0001	0.9999	78.80
36.5	161,220	1	0.0000	1.0000	78.80
37.5	113,662	1	0.0000	1.0000	78.80
38.5	108,051	8	0.0001	0.9999	78.80

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1932-2009

EXPERIENCE BAND 1949-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	102,782	5	0.0000	1.0000	78.79
40.5	98,111	0	0.0000	1.0000	78.79
41.5	92,117		0.0000	1.0000	78.79
42.5	80,042	3,523	0.0440	0.9560	78.79
43.5	64,197	2,716	0.0423	0.9577	75.32
44.5	54,192		0.0000	1.0000	72.13
45.5	43,974		0.0000	1.0000	72.13
46.5	29,992		0.0000	1.0000	72.13
47.5	21,242	150	0.0071	0.9929	72.13
48.5	13,958		0.0000	1.0000	71.62
49.5	11,257		0.0000	1.0000	71.62
50.5	10,967		0.0000	1.0000	71.62
51.5	5,927		0.0000	1.0000	71.62
52.5	5,927		0.0000	1.0000	71.62
53.5	5,927		0.0000	1.0000	71.62
54.5	4,537		0.0000	1.0000	71.62
55.5	4,337		0.0000	1.0000	71.62
56.5	2,727		0.0000	1.0000	71.62
57.5	2,344		0.0000	1.0000	71.62
58.5	2,344		0.0000	1.0000	71.62
59.5	2,344		0.0000	1.0000	71.62
60.5	390		0.0000	1.0000	71.62
61.5	390		0.0000	1.0000	71.62
62.5	390		0.0000	1.0000	71.62
63.5	390		0.0000	1.0000	71.62
64.5	150		0.0000	1.0000	71.62
65.5	150		0.0000	1.0000	71.62
66.5	150		0.0000	1.0000	71.62
67.5	150		0.0000	1.0000	71.62
68.5	150		0.0000	1.0000	71.62
69.5	150		0.0000	1.0000	71.62
70.5	150		0.0000	1.0000	71.62
71.5	150		0.0000	1.0000	71.62
72.5	150	150	1.0000		71.62
73.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1932-2009			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	130,300	0.0000	1.0000	100.00	
0.5	130,300	0.0000	1.0000	100.00	
1.5	130,300	0.0000	1.0000	100.00	
2.5	131,594	0.0000	1.0000	100.00	
3.5	131,594	0.0000	1.0000	100.00	
4.5	140,697	0.0000	1.0000	100.00	
5.5	140,697	0.0000	1.0000	100.00	
6.5	141,455	0.0000	1.0000	100.00	
7.5	167,839	0.0000	1.0000	100.00	
8.5	167,839	0.0000	1.0000	100.00	
9.5	145,181	0.0000	1.0000	100.00	
10.5	46,162	0.0000	1.0000	100.00	
11.5	44,868	0.0000	1.0000	100.00	
12.5	47,302	0.0000	1.0000	100.00	
13.5	39,522	0.0000	1.0000	100.00	
14.5	43,501	0.0000	1.0000	100.00	
15.5	42,744	0.0000	1.0000	100.00	
16.5	23,022	0.0000	1.0000	100.00	
17.5	23,022	0.0000	1.0000	100.00	
18.5	14,399	0.0000	1.0000	100.00	
19.5	15,110	0.0000	1.0000	100.00	
20.5	43,999	0.0000	1.0000	100.00	
21.5	54,509	0.0000	1.0000	100.00	
22.5	74,661	0.0000	1.0000	100.00	
23.5	99,187	0.0000	1.0000	100.00	
24.5	138,717	1,324	0.0095	0.9905	100.00
25.5	140,281		0.0000	1.0000	99.05
26.5	184,371		0.0000	1.0000	99.05
27.5	218,475	21,842	0.1000	0.9000	99.05
28.5	240,829	1,697	0.0070	0.9930	89.14
29.5	215,525		0.0000	1.0000	88.52
30.5	203,805		0.0000	1.0000	88.52
31.5	188,062		0.0000	1.0000	88.52
32.5	167,635		0.0000	1.0000	88.52
33.5	141,552		0.0000	1.0000	88.52
34.5	151,152	165	0.0011	0.9989	88.52
35.5	111,265		0.0000	1.0000	88.42
36.5	109,221		0.0000	1.0000	88.42
37.5	73,944		0.0000	1.0000	88.42
38.5	75,963		0.0000	1.0000	88.42

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

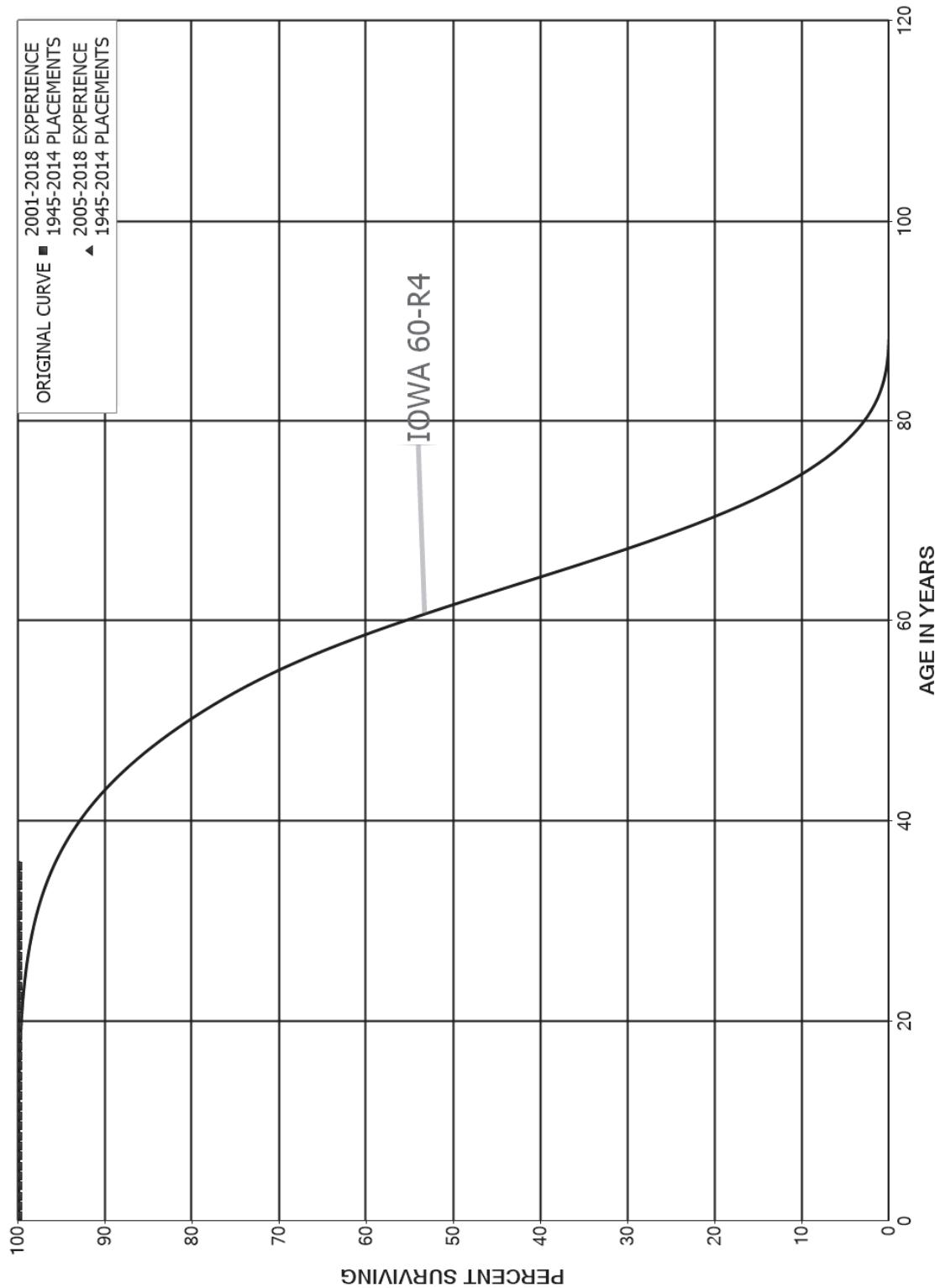
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1932-2009

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	78,129		0.0000	1.0000	88.42
40.5	76,607		0.0000	1.0000	88.42
41.5	74,869		0.0000	1.0000	88.42
42.5	71,435	3,523	0.0493	0.9507	88.42
43.5	58,305	2,716	0.0466	0.9534	84.06
44.5	48,300		0.0000	1.0000	80.14
45.5	39,287		0.0000	1.0000	80.14
46.5	25,505		0.0000	1.0000	80.14
47.5	18,515	150	0.0081	0.9919	80.14
48.5	11,614		0.0000	1.0000	79.49
49.5	8,913		0.0000	1.0000	79.49
50.5	8,623		0.0000	1.0000	79.49
51.5	5,537		0.0000	1.0000	79.49
52.5	5,537		0.0000	1.0000	79.49
53.5	5,537		0.0000	1.0000	79.49
54.5	4,147		0.0000	1.0000	79.49
55.5	4,187		0.0000	1.0000	79.49
56.5	2,577		0.0000	1.0000	79.49
57.5	2,194		0.0000	1.0000	79.49
58.5	2,194		0.0000	1.0000	79.49
59.5	2,194		0.0000	1.0000	79.49
60.5	240		0.0000	1.0000	79.49
61.5	240		0.0000	1.0000	79.49
62.5	240		0.0000	1.0000	79.49
63.5	240		0.0000	1.0000	79.49
64.5					79.49
65.5					
66.5					
67.5					
68.5					
69.5					
70.5					
71.5					
72.5		150	150	1.0000	
73.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 374.02 RIGHTS OF WAY
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 374.02 RIGHTS OF WAY

ORIGINAL LIFE TABLE

PLACEMENT BAND 1945-2014

EXPERIENCE BAND 2001-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	312,072	0.0000	1.0000	100.00	
0.5	312,072	0.0000	1.0000	100.00	
1.5	312,072	0.0000	1.0000	100.00	
2.5	312,072	0.0000	1.0000	100.00	
3.5	312,072	0.0000	1.0000	100.00	
4.5	290,396	0.0000	1.0000	100.00	
5.5	286,750	0.0000	1.0000	100.00	
6.5	286,750	0.0000	1.0000	100.00	
7.5	286,750	0.0000	1.0000	100.00	
8.5	286,578	0.0000	1.0000	100.00	
9.5	286,578	0.0000	1.0000	100.00	
10.5	286,608	0.0000	1.0000	100.00	
11.5	293,776	0.0000	1.0000	100.00	
12.5	293,776	0.0000	1.0000	100.00	
13.5	293,776	0.0000	1.0000	100.00	
14.5	293,776	0.0000	1.0000	100.00	
15.5	9,733	0.0000	1.0000	100.00	
16.5	386	0.0000	1.0000	100.00	
17.5	287	0.0000	1.0000	100.00	
18.5	296	0.0000	1.0000	100.00	
19.5	924	0.0000	1.0000	100.00	
20.5	6,657	0.0000	1.0000	100.00	
21.5	6,712	0.0000	1.0000	100.00	
22.5	6,722	0.0000	1.0000	100.00	
23.5	7,437	0.0000	1.0000	100.00	
24.5	7,437	0.0000	1.0000	100.00	
25.5	6,395	0.0000	1.0000	100.00	
26.5	6,331	0.0000	1.0000	100.00	
27.5	6,321	0.0000	1.0000	100.00	
28.5	2,624	0.0000	1.0000	100.00	
29.5	1,996	0.0000	1.0000	100.00	
30.5	348	0.0000	1.0000	100.00	
31.5	348	0.0000	1.0000	100.00	
32.5	348	0.0000	1.0000	100.00	
33.5	348	0.0000	1.0000	100.00	
34.5	348	0.0000	1.0000	100.00	
35.5					100.00
36.5					
37.5					
38.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 374.02 RIGHTS OF WAY

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1945-2014

EXPERIENCE BAND 2001-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5					
40.5					
41.5					
42.5					
43.5					
44.5					
45.5					
46.5					
47.5					
48.5	3,404		0.0000		
49.5	3,404		0.0000		
50.5	3,404		0.0000		
51.5	3,404		0.0000		
52.5	3,404		0.0000		
53.5					
54.5					
55.5					
56.5					
57.5					
58.5	495		0.0000		
59.5	495		0.0000		
60.5	495		0.0000		
61.5	495		0.0000		
62.5	495		0.0000		
63.5					
64.5					
65.5					
66.5					
67.5	640		0.0000		
68.5	2,530		0.0000		
69.5	2,530		0.0000		
70.5	2,530		0.0000		
71.5	2,530		0.0000		
72.5	1,890		0.0000		
73.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 374.02 RIGHTS OF WAY

ORIGINAL LIFE TABLE

PLACEMENT BAND 1945-2014

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	25,493	0.0000	1.0000	100.00	
0.5	25,493	0.0000	1.0000	100.00	
1.5	309,536	0.0000	1.0000	100.00	
2.5	311,714	0.0000	1.0000	100.00	
3.5	312,072	0.0000	1.0000	100.00	
4.5	290,396	0.0000	1.0000	100.00	
5.5	286,750	0.0000	1.0000	100.00	
6.5	286,750	0.0000	1.0000	100.00	
7.5	286,750	0.0000	1.0000	100.00	
8.5	286,578	0.0000	1.0000	100.00	
9.5	286,578	0.0000	1.0000	100.00	
10.5	286,608	0.0000	1.0000	100.00	
11.5	293,776	0.0000	1.0000	100.00	
12.5	293,776	0.0000	1.0000	100.00	
13.5	293,776	0.0000	1.0000	100.00	
14.5	293,776	0.0000	1.0000	100.00	
15.5	9,733	0.0000	1.0000	100.00	
16.5	386	0.0000	1.0000	100.00	
17.5	287	0.0000	1.0000	100.00	
18.5	296	0.0000	1.0000	100.00	
19.5	924	0.0000	1.0000	100.00	
20.5	6,657	0.0000	1.0000	100.00	
21.5	6,712	0.0000	1.0000	100.00	
22.5	6,722	0.0000	1.0000	100.00	
23.5	7,437	0.0000	1.0000	100.00	
24.5	7,437	0.0000	1.0000	100.00	
25.5	6,395	0.0000	1.0000	100.00	
26.5	6,331	0.0000	1.0000	100.00	
27.5	6,321	0.0000	1.0000	100.00	
28.5	2,624	0.0000	1.0000	100.00	
29.5	1,996	0.0000	1.0000	100.00	
30.5	348	0.0000	1.0000	100.00	
31.5	348	0.0000	1.0000	100.00	
32.5	348	0.0000	1.0000	100.00	
33.5	348	0.0000	1.0000	100.00	
34.5	348	0.0000	1.0000	100.00	
35.5					100.00
36.5					
37.5					
38.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 374.02 RIGHTS OF WAY

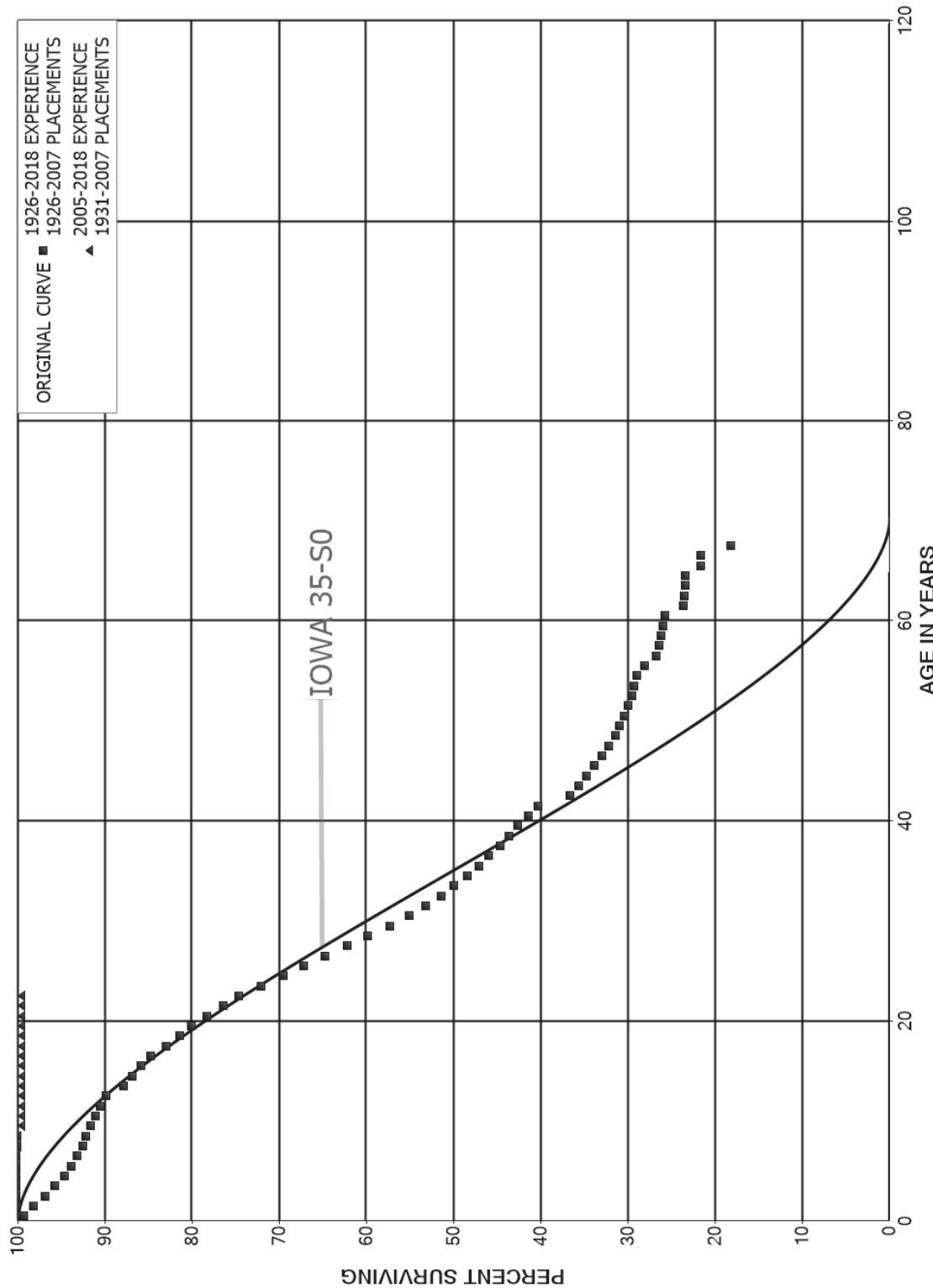
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1945-2014

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5					
40.5					
41.5					
42.5					
43.5					
44.5					
45.5					
46.5					
47.5					
48.5	3,404		0.0000		
49.5	3,404		0.0000		
50.5	3,404		0.0000		
51.5	3,404		0.0000		
52.5	3,404		0.0000		
53.5					
54.5					
55.5					
56.5					
57.5					
58.5	495		0.0000		
59.5	495		0.0000		
60.5	495		0.0000		
61.5	495		0.0000		
62.5	495		0.0000		
63.5					
64.5					
65.5					
66.5					
67.5	640		0.0000		
68.5	2,530		0.0000		
69.5	2,530		0.0000		
70.5	2,530		0.0000		
71.5	2,530		0.0000		
72.5	1,890		0.0000		
73.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2007

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	288,857	2,114	0.0073	0.9927	100.00
0.5	286,743	3,305	0.0115	0.9885	99.27
1.5	283,438	3,580	0.0126	0.9874	98.12
2.5	279,857	3,434	0.0123	0.9877	96.88
3.5	276,423	2,987	0.0108	0.9892	95.70
4.5	273,436	2,407	0.0088	0.9912	94.66
5.5	271,029	2,024	0.0075	0.9925	93.83
6.5	269,005	1,723	0.0064	0.9936	93.13
7.5	267,283	1,170	0.0044	0.9956	92.53
8.5	266,113	1,541	0.0058	0.9942	92.13
9.5	264,572	1,590	0.0060	0.9940	91.59
10.5	277,536	1,789	0.0064	0.9936	91.04
11.5	268,134	1,958	0.0073	0.9927	90.46
12.5	256,943	5,611	0.0218	0.9782	89.80
13.5	241,056	2,818	0.0117	0.9883	87.83
14.5	226,799	2,479	0.0109	0.9891	86.81
15.5	207,177	2,679	0.0129	0.9871	85.86
16.5	204,498	4,476	0.0219	0.9781	84.75
17.5	200,301	3,502	0.0175	0.9825	82.89
18.5	196,799	3,409	0.0173	0.9827	81.44
19.5	192,729	4,328	0.0225	0.9775	80.03
20.5	182,659	4,345	0.0238	0.9762	78.24
21.5	178,315	4,157	0.0233	0.9767	76.37
22.5	145,747	4,854	0.0333	0.9667	74.59
23.5	140,893	5,056	0.0359	0.9641	72.11
24.5	135,837	4,640	0.0342	0.9658	69.52
25.5	131,197	4,767	0.0363	0.9637	67.15
26.5	126,430	5,031	0.0398	0.9602	64.71
27.5	121,399	4,564	0.0376	0.9624	62.13
28.5	116,836	4,828	0.0413	0.9587	59.80
29.5	112,007	4,387	0.0392	0.9608	57.33
30.5	107,621	3,717	0.0345	0.9655	55.08
31.5	103,904	3,414	0.0329	0.9671	53.18
32.5	100,489	2,854	0.0284	0.9716	51.43
33.5	97,636	2,984	0.0306	0.9694	49.97
34.5	94,651	2,587	0.0273	0.9727	48.44
35.5	92,064	2,387	0.0259	0.9741	47.12
36.5	89,677	2,435	0.0272	0.9728	45.90
37.5	87,242	2,062	0.0236	0.9764	44.65
38.5	85,180	2,022	0.0237	0.9763	43.60

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2007

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	83,158	2,234	0.0269	0.9731	42.56
40.5	80,924	2,199	0.0272	0.9728	41.42
41.5	78,725	7,090	0.0901	0.9099	40.29
42.5	72,282	2,124	0.0294	0.9706	36.66
43.5	70,808	1,772	0.0250	0.9750	35.59
44.5	70,512	1,716	0.0243	0.9757	34.70
45.5	68,931	1,723	0.0250	0.9750	33.85
46.5	67,483	1,723	0.0255	0.9745	33.01
47.5	65,202	1,540	0.0236	0.9764	32.16
48.5	72,104	1,154	0.0160	0.9840	31.40
49.5	69,554	1,215	0.0175	0.9825	30.90
50.5	68,204	1,005	0.0147	0.9853	30.36
51.5	66,794	835	0.0125	0.9875	29.91
52.5	65,869	653	0.0099	0.9901	29.54
53.5	55,341	478	0.0086	0.9914	29.25
54.5	52,180	1,590	0.0305	0.9695	28.99
55.5	16,614	818	0.0492	0.9508	28.11
56.5	15,806	196	0.0124	0.9876	26.73
57.5	14,916	154	0.0103	0.9897	26.39
58.5	14,762	117	0.0079	0.9921	26.12
59.5	14,315	76	0.0053	0.9947	25.92
60.5	13,599	1,157	0.0851	0.9149	25.78
61.5	11,268	42	0.0037	0.9963	23.58
62.5	11,227	33	0.0029	0.9971	23.50
63.5	11,111	16	0.0015	0.9985	23.43
64.5	11,094	821	0.0740	0.9260	23.39
65.5	11,874	1	0.0001	0.9999	21.66
66.5	11,873	1,941	0.1634	0.8366	21.66
67.5	9,932	1,762	0.1774	0.8226	18.12
68.5	5,449	1	0.0003	0.9997	14.91
69.5	4,506	1	0.0002	0.9998	14.90
70.5	2,726	0.0000	1.0000	14.90	
71.5	2,726	0.0000	1.0000	14.90	
72.5	2,726	0.0000	1.0000	14.90	
73.5	2,726	0.0000	1.0000	14.90	
74.5	1,094	0.0000	1.0000	14.90	
75.5	1,094	0.0000	1.0000	14.90	
76.5	1,094	0.0000	1.0000	14.90	
77.5	1,094	0.0000	1.0000	14.90	
78.5	708	0.0000	1.0000	14.90	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2007

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	708	0.0000	1.0000		14.90
80.5	348	0.0000	1.0000		14.90
81.5	840	0.0000	1.0000		14.90
82.5	2,160	0.0000	1.0000		14.90
83.5	2,160	0.0000	1.0000		14.90
84.5	2,160	0.0000	1.0000		14.90
85.5	2,160	0.0000	1.0000		14.90
86.5	1,320	0.0000	1.0000		14.90
87.5					14.90

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1931-2007

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	27,122	0	0.0000	1.0000	100.00
0.5	38,564	3	0.0001	0.9999	100.00
1.5	41,661	3	0.0001	0.9999	99.99
2.5	41,658	0	0.0000	1.0000	99.98
3.5	41,658	0	0.0000	1.0000	99.98
4.5	41,658		0.0000	1.0000	99.98
5.5	42,323	4	0.0001	0.9999	99.98
6.5	47,594	42	0.0009	0.9991	99.97
7.5	47,552	0	0.0000	1.0000	99.89
8.5	76,038	352	0.0046	0.9954	99.89
9.5	75,686		0.0000	1.0000	99.42
10.5	90,240	2	0.0000	1.0000	99.42
11.5	82,625		0.0000	1.0000	99.42
12.5	73,392		0.0000	1.0000	99.42
13.5	63,116		0.0000	1.0000	99.42
14.5	51,677		0.0000	1.0000	99.42
15.5	34,534		0.0000	1.0000	99.42
16.5	34,534		0.0000	1.0000	99.42
17.5	34,813		0.0000	1.0000	99.42
18.5	34,813		0.0000	1.0000	99.42
19.5	34,152		0.0000	1.0000	99.42
20.5	28,410		0.0000	1.0000	99.42
21.5	28,410		0.0000	1.0000	99.42
22.5					99.42
23.5					
24.5					
25.5					
26.5					
27.5					
28.5					
29.5					
30.5					
31.5					
32.5					
33.5					
34.5	871	88	0.1008		
35.5	784		0.0000		
36.5	784	1	0.0008		
37.5	1,596	92	0.0576		
38.5	1,504		0.0000		

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1931-2007		EXPERIENCE BAND 2005-2018			
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	1,504	1	0.0004		
40.5	4,872	432	0.0886		
41.5	43,707	5,255	0.1202		
42.5	39,099	3	0.0001		
43.5	40,559	155	0.0038		
44.5	41,880		0.0000		
45.5	42,015	1	0.0000		
46.5	43,277	166	0.0038		
47.5	43,251	123	0.0028		
48.5	51,570	1	0.0000		
49.5	50,290	33	0.0007		
50.5	50,121		0.0000		
51.5	49,716	0	0.0000		
52.5	49,625		0.0000		
53.5	39,750		0.0000		
54.5	41,008	1,215	0.0296		
55.5	7,290	529	0.0726		
56.5	6,770	5	0.0007		
57.5	6,072	2	0.0003		
58.5	6,070		0.0000		
59.5	5,740		0.0000		
60.5	7,827	1,092	0.1395		
61.5	5,561		0.0000		
62.5	5,561	3	0.0006		
63.5	5,475		0.0000		
64.5	6,674	813	0.1218		
65.5	7,461		0.0000		
66.5	9,763	1,941	0.1988		
67.5	9,932	1,762	0.1774		
68.5	5,449	1	0.0003		
69.5	4,506	1	0.0002		
70.5	2,726		0.0000		
71.5	2,726		0.0000		
72.5	2,726		0.0000		
73.5	2,726		0.0000		
74.5	1,094		0.0000		
75.5	1,094		0.0000		
76.5	1,094		0.0000		
77.5	1,094		0.0000		
78.5	708		0.0000		

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

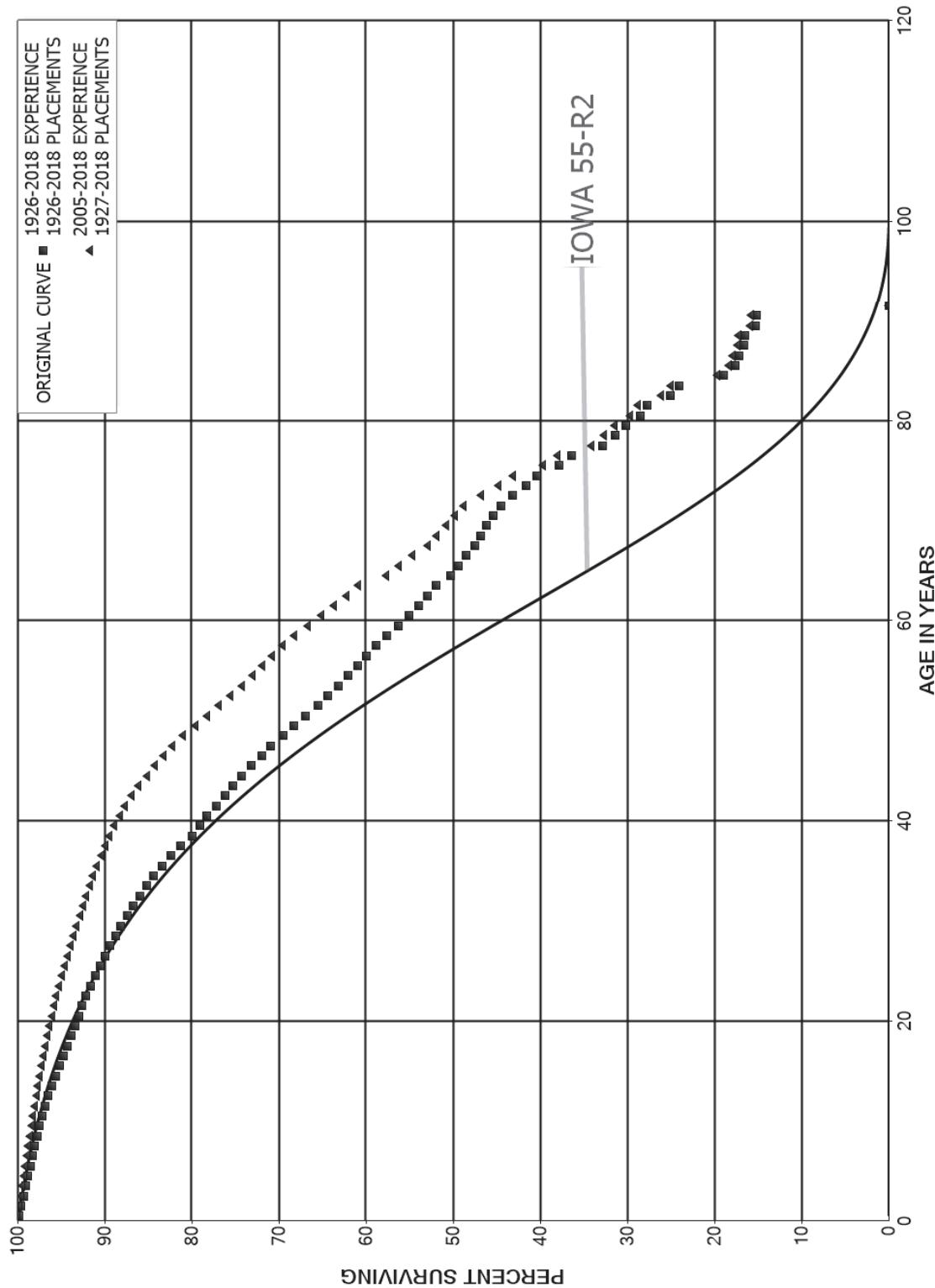
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1931-2007

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	708		0.0000		
80.5	348		0.0000		
81.5	840		0.0000		
82.5	2,160		0.0000		
83.5	2,160		0.0000		
84.5	2,160		0.0000		
85.5	2,160		0.0000		
86.5	1,320		0.0000		
87.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNTS 376.00 THROUGH 376.02 MAINS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	217,281,490	325,757	0.0015	0.9985	100.00
0.5	209,457,840	560,376	0.0027	0.9973	99.85
1.5	200,111,785	529,453	0.0026	0.9974	99.58
2.5	187,863,655	478,861	0.0025	0.9975	99.32
3.5	172,405,004	461,635	0.0027	0.9973	99.07
4.5	165,458,283	433,654	0.0026	0.9974	98.80
5.5	152,160,230	377,485	0.0025	0.9975	98.54
6.5	137,476,274	381,891	0.0028	0.9972	98.30
7.5	131,306,409	370,124	0.0028	0.9972	98.02
8.5	126,975,704	363,982	0.0029	0.9971	97.75
9.5	119,812,270	357,911	0.0030	0.9970	97.47
10.5	115,546,057	392,727	0.0034	0.9966	97.18
11.5	111,514,844	407,883	0.0037	0.9963	96.85
12.5	104,208,163	491,527	0.0047	0.9953	96.49
13.5	99,916,107	481,071	0.0048	0.9952	96.04
14.5	93,148,645	365,224	0.0039	0.9961	95.57
15.5	87,221,445	443,000	0.0051	0.9949	95.20
16.5	83,737,767	388,551	0.0046	0.9954	94.72
17.5	80,348,401	411,508	0.0051	0.9949	94.28
18.5	77,408,688	352,675	0.0046	0.9954	93.79
19.5	74,656,624	322,180	0.0043	0.9957	93.37
20.5	71,751,694	302,722	0.0042	0.9958	92.96
21.5	67,284,017	301,586	0.0045	0.9955	92.57
22.5	63,452,024	349,668	0.0055	0.9945	92.16
23.5	59,145,954	377,890	0.0064	0.9936	91.65
24.5	55,373,217	316,890	0.0057	0.9943	91.06
25.5	51,572,606	322,399	0.0063	0.9937	90.54
26.5	47,435,792	320,156	0.0067	0.9933	89.98
27.5	44,836,286	302,211	0.0067	0.9933	89.37
28.5	41,641,810	299,005	0.0072	0.9928	88.77
29.5	36,955,646	288,190	0.0078	0.9922	88.13
30.5	35,259,724	296,507	0.0084	0.9916	87.44
31.5	32,194,221	273,234	0.0085	0.9915	86.71
32.5	30,062,890	262,977	0.0087	0.9913	85.97
33.5	28,848,231	296,280	0.0103	0.9897	85.22
34.5	27,272,308	291,764	0.0107	0.9893	84.34
35.5	25,061,641	298,952	0.0119	0.9881	83.44
36.5	23,655,152	323,239	0.0137	0.9863	82.45
37.5	22,049,496	358,013	0.0162	0.9838	81.32
38.5	19,957,090	222,626	0.0112	0.9888	80.00

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	18,743,000	202,087	0.0108	0.9892	79.11
40.5	16,833,772	234,533	0.0139	0.9861	78.25
41.5	15,177,283	187,010	0.0123	0.9877	77.16
42.5	13,760,987	163,162	0.0119	0.9881	76.21
43.5	12,696,191	178,274	0.0140	0.9860	75.31
44.5	12,389,656	183,171	0.0148	0.9852	74.25
45.5	11,353,800	180,041	0.0159	0.9841	73.15
46.5	10,717,999	161,290	0.0150	0.9850	71.99
47.5	10,145,966	198,756	0.0196	0.9804	70.91
48.5	9,384,909	170,523	0.0182	0.9818	69.52
49.5	8,611,599	162,700	0.0189	0.9811	68.26
50.5	8,038,032	172,114	0.0214	0.9786	66.97
51.5	7,522,245	134,841	0.0179	0.9821	65.53
52.5	6,865,551	131,595	0.0192	0.9808	64.36
53.5	6,336,531	109,167	0.0172	0.9828	63.13
54.5	5,773,575	97,933	0.0170	0.9830	62.04
55.5	4,948,228	84,749	0.0171	0.9829	60.99
56.5	4,302,511	82,636	0.0192	0.9808	59.94
57.5	3,872,794	79,931	0.0206	0.9794	58.79
58.5	3,578,388	78,659	0.0220	0.9780	57.58
59.5	3,113,513	68,121	0.0219	0.9781	56.31
60.5	2,937,846	60,467	0.0206	0.9794	55.08
61.5	2,748,214	53,050	0.0193	0.9807	53.95
62.5	2,638,569	45,638	0.0173	0.9827	52.90
63.5	2,373,311	80,100	0.0338	0.9662	51.99
64.5	2,147,008	36,685	0.0171	0.9829	50.23
65.5	1,890,927	33,136	0.0175	0.9825	49.38
66.5	1,757,614	35,996	0.0205	0.9795	48.51
67.5	1,681,389	22,756	0.0135	0.9865	47.52
68.5	1,584,531	25,206	0.0159	0.9841	46.87
69.5	1,480,257	24,506	0.0166	0.9834	46.13
70.5	1,012,725	18,096	0.0179	0.9821	45.37
71.5	968,216	30,530	0.0315	0.9685	44.55
72.5	916,127	31,637	0.0345	0.9655	43.15
73.5	872,583	25,603	0.0293	0.9707	41.66
74.5	810,476	53,088	0.0655	0.9345	40.44
75.5	749,012	26,629	0.0356	0.9644	37.79
76.5	670,097	66,539	0.0993	0.9007	36.44
77.5	589,991	26,106	0.0442	0.9558	32.83
78.5	515,522	19,201	0.0372	0.9628	31.37

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	443,695	24,802	0.0559	0.9441	30.21
80.5	418,893	12,265	0.0293	0.9707	28.52
81.5	291,123	27,657	0.0950	0.9050	27.68
82.5	263,169	10,817	0.0411	0.9589	25.05
83.5	299,130	63,707	0.2130	0.7870	24.02
84.5	235,423	16,381	0.0696	0.9304	18.91
85.5	219,042	5,470	0.0250	0.9750	17.59
86.5	208,111	6,438	0.0309	0.9691	17.15
87.5	201,673	1,590	0.0079	0.9921	16.62
88.5	29,553	2,161	0.0731	0.9269	16.49
89.5	27,392	265	0.0097	0.9903	15.28
90.5	15	15	1.0000		15.14
91.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1927-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	112,735,784	108,707	0.0010	0.9990	100.00
0.5	111,504,872	203,488	0.0018	0.9982	99.90
1.5	108,152,338	200,330	0.0019	0.9981	99.72
2.5	99,416,112	174,141	0.0018	0.9982	99.54
3.5	87,449,018	159,355	0.0018	0.9982	99.36
4.5	83,428,871	138,658	0.0017	0.9983	99.18
5.5	72,921,272	121,105	0.0017	0.9983	99.02
6.5	61,253,015	109,422	0.0018	0.9982	98.85
7.5	59,643,361	110,091	0.0018	0.9982	98.68
8.5	59,130,592	111,464	0.0019	0.9981	98.49
9.5	56,302,717	107,207	0.0019	0.9981	98.31
10.5	55,783,695	101,928	0.0018	0.9982	98.12
11.5	55,571,618	103,732	0.0019	0.9981	97.94
12.5	52,495,452	96,984	0.0018	0.9982	97.76
13.5	50,961,186	101,225	0.0020	0.9980	97.58
14.5	47,537,626	101,419	0.0021	0.9979	97.38
15.5	46,448,194	103,427	0.0022	0.9978	97.18
16.5	44,997,605	103,676	0.0023	0.9977	96.96
17.5	44,830,330	112,310	0.0025	0.9975	96.74
18.5	44,157,142	109,633	0.0025	0.9975	96.49
19.5	42,735,545	119,674	0.0028	0.9972	96.25
20.5	41,381,563	113,583	0.0027	0.9973	95.98
21.5	39,114,353	110,624	0.0028	0.9972	95.72
22.5	36,666,867	122,409	0.0033	0.9967	95.45
23.5	33,970,901	116,267	0.0034	0.9966	95.13
24.5	32,429,078	113,584	0.0035	0.9965	94.81
25.5	29,900,491	104,360	0.0035	0.9965	94.47
26.5	27,584,586	97,478	0.0035	0.9965	94.14
27.5	26,685,478	94,656	0.0035	0.9965	93.81
28.5	25,043,956	91,441	0.0037	0.9963	93.48
29.5	21,306,570	85,007	0.0040	0.9960	93.14
30.5	20,259,680	76,762	0.0038	0.9962	92.77
31.5	18,365,217	72,478	0.0039	0.9961	92.41
32.5	16,967,298	74,743	0.0044	0.9956	92.05
33.5	16,370,536	72,346	0.0044	0.9956	91.64
34.5	15,709,724	73,459	0.0047	0.9953	91.24
35.5	14,199,674	76,296	0.0054	0.9946	90.81
36.5	13,488,640	71,560	0.0053	0.9947	90.32
37.5	12,527,935	65,540	0.0052	0.9948	89.85
38.5	11,317,565	74,995	0.0066	0.9934	89.38

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1927-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	10,690,857	67,101	0.0063	0.9937	88.78
40.5	9,367,409	69,692	0.0074	0.9926	88.23
41.5	8,748,047	76,004	0.0087	0.9913	87.57
42.5	8,140,812	70,777	0.0087	0.9913	86.81
43.5	7,601,331	86,309	0.0114	0.9886	86.05
44.5	7,686,689	83,571	0.0109	0.9891	85.08
45.5	7,249,558	86,123	0.0119	0.9881	84.15
46.5	6,857,557	82,801	0.0121	0.9879	83.15
47.5	6,519,647	97,213	0.0149	0.9851	82.15
48.5	5,934,453	100,575	0.0169	0.9831	80.92
49.5	5,490,914	97,999	0.0178	0.9822	79.55
50.5	5,229,342	88,315	0.0169	0.9831	78.13
51.5	5,095,197	84,230	0.0165	0.9835	76.81
52.5	4,626,780	84,689	0.0183	0.9817	75.54
53.5	4,201,078	66,027	0.0157	0.9843	74.16
54.5	3,786,629	58,638	0.0155	0.9845	72.99
55.5	3,035,764	49,336	0.0163	0.9837	71.86
56.5	3,067,130	51,100	0.0167	0.9833	70.70
57.5	2,707,936	52,223	0.0193	0.9807	69.52
58.5	2,473,586	54,719	0.0221	0.9779	68.18
59.5	2,051,374	47,944	0.0234	0.9766	66.67
60.5	1,953,265	44,383	0.0227	0.9773	65.11
61.5	1,793,135	41,506	0.0231	0.9769	63.63
62.5	1,780,011	39,102	0.0220	0.9780	62.16
63.5	1,540,864	79,575	0.0516	0.9484	60.79
64.5	1,400,325	36,685	0.0262	0.9738	57.65
65.5	1,236,098	33,136	0.0268	0.9732	56.14
66.5	1,102,785	35,996	0.0326	0.9674	54.64
67.5	1,241,675	22,756	0.0183	0.9817	52.86
68.5	1,145,373	25,206	0.0220	0.9780	51.89
69.5	1,282,601	24,506	0.0191	0.9809	50.74
70.5	815,069	18,096	0.0222	0.9778	49.78
71.5	770,560	30,530	0.0396	0.9604	48.67
72.5	730,182	31,637	0.0433	0.9567	46.74
73.5	686,637	25,603	0.0373	0.9627	44.72
74.5	674,265	53,088	0.0787	0.9213	43.05
75.5	612,801	26,629	0.0435	0.9565	39.66
76.5	659,625	66,539	0.1009	0.8991	37.94
77.5	589,991	26,106	0.0442	0.9558	34.11
78.5	515,522	19,201	0.0372	0.9628	32.60

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

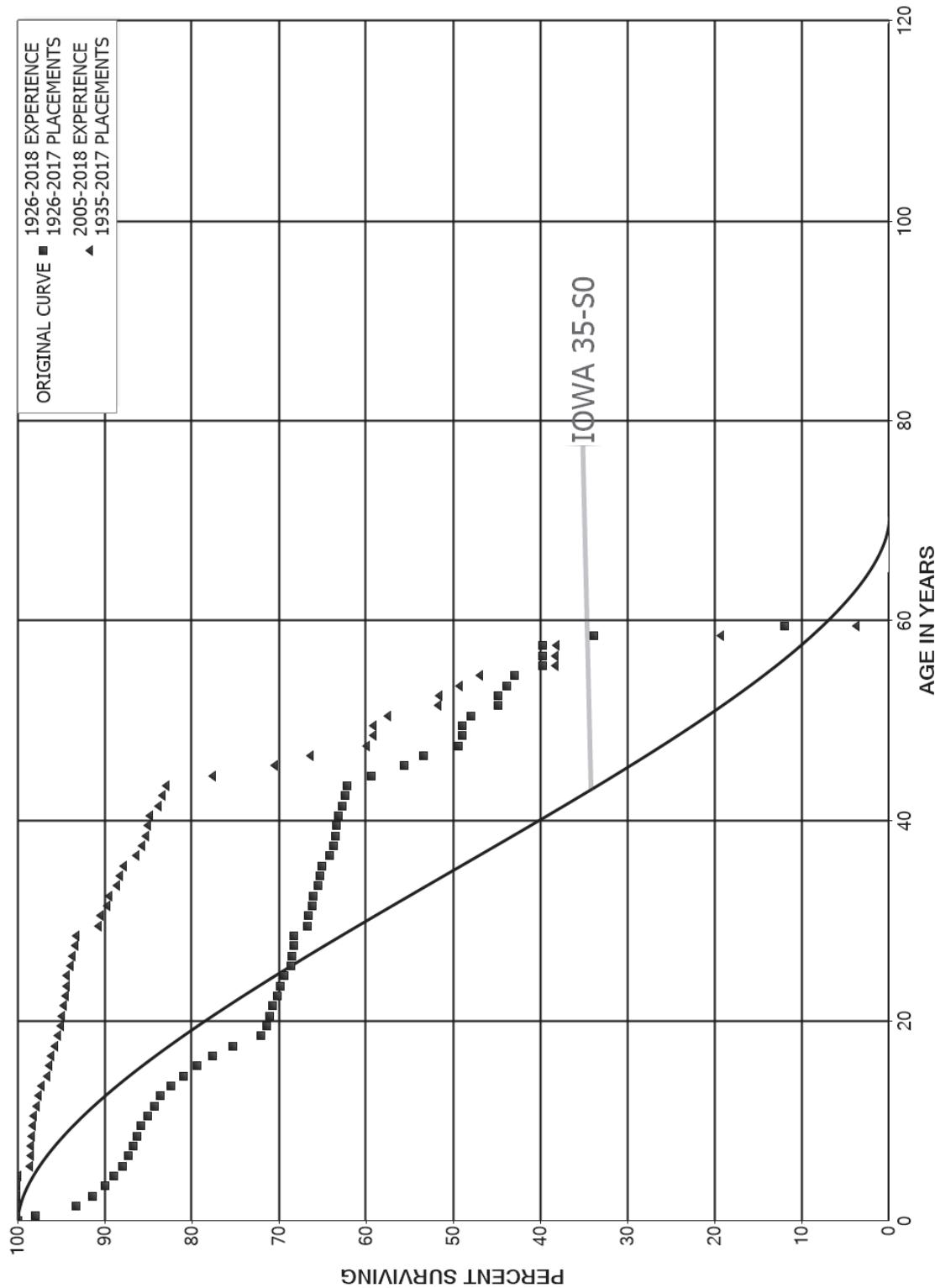
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1927-2018

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	443,695	24,802	0.0559	0.9441	31.39
80.5	418,893	12,265	0.0293	0.9707	29.63
81.5	291,123	27,657	0.0950	0.9050	28.76
82.5	263,169	10,817	0.0411	0.9589	26.03
83.5	299,130	63,707	0.2130	0.7870	24.96
84.5	235,423	16,381	0.0696	0.9304	19.65
85.5	219,042	5,470	0.0250	0.9750	18.28
86.5	208,111	6,438	0.0309	0.9691	17.82
87.5	201,673	1,590	0.0079	0.9921	17.27
88.5	29,553	2,161	0.0731	0.9269	17.13
89.5	27,392	265	0.0097	0.9903	15.88
90.5	15	15	1.0000		15.73
91.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2017			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	6,897,961	141,041	0.0204	0.9796	100.00
0.5	6,757,161	322,727	0.0478	0.9522	97.96
1.5	6,338,143	128,513	0.0203	0.9797	93.28
2.5	6,186,200	93,286	0.0151	0.9849	91.39
3.5	5,191,602	61,577	0.0119	0.9881	90.01
4.5	4,968,287	58,604	0.0118	0.9882	88.94
5.5	4,796,687	33,361	0.0070	0.9930	87.89
6.5	4,547,558	26,218	0.0058	0.9942	87.28
7.5	3,849,230	20,256	0.0053	0.9947	86.78
8.5	3,822,069	21,272	0.0056	0.9944	86.32
9.5	3,623,047	31,164	0.0086	0.9914	85.84
10.5	3,562,442	33,001	0.0093	0.9907	85.10
11.5	3,406,751	27,522	0.0081	0.9919	84.31
12.5	3,286,154	49,955	0.0152	0.9848	83.63
13.5	3,212,949	57,302	0.0178	0.9822	82.36
14.5	3,118,168	56,747	0.0182	0.9818	80.89
15.5	2,999,331	68,190	0.0227	0.9773	79.42
16.5	2,905,904	88,964	0.0306	0.9694	77.61
17.5	2,680,126	111,742	0.0417	0.9583	75.24
18.5	2,550,622	23,772	0.0093	0.9907	72.10
19.5	2,518,260	12,094	0.0048	0.9952	71.43
20.5	2,407,519	13,777	0.0057	0.9943	71.09
21.5	2,296,819	14,882	0.0065	0.9935	70.68
22.5	2,241,928	13,072	0.0058	0.9942	70.22
23.5	2,144,770	13,627	0.0064	0.9936	69.81
24.5	1,965,203	20,789	0.0106	0.9894	69.37
25.5	1,793,336	3,963	0.0022	0.9978	68.63
26.5	1,542,587	3,539	0.0023	0.9977	68.48
27.5	1,475,556	1,736	0.0012	0.9988	68.33
28.5	1,376,147	29,991	0.0218	0.9782	68.24
29.5	1,237,959	2,923	0.0024	0.9976	66.76
30.5	1,041,899	6,949	0.0067	0.9933	66.60
31.5	905,357	1,927	0.0021	0.9979	66.16
32.5	778,965	5,715	0.0073	0.9927	66.01
33.5	763,947	2,589	0.0034	0.9966	65.53
34.5	679,495	2,807	0.0041	0.9959	65.31
35.5	654,425	8,332	0.0127	0.9873	65.04
36.5	630,100	4,228	0.0067	0.9933	64.21
37.5	645,703	2,433	0.0038	0.9962	63.78
38.5	562,347	1,460	0.0026	0.9974	63.54

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2017			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	535,576	1,298	0.0024	0.9976	63.37
40.5	481,316	4,170	0.0087	0.9913	63.22
41.5	457,313	2,183	0.0048	0.9952	62.67
42.5	241,296	863	0.0036	0.9964	62.37
43.5	233,291	10,161	0.0436	0.9564	62.15
44.5	193,353	12,400	0.0641	0.9359	59.44
45.5	179,638	7,269	0.0405	0.9595	55.63
46.5	171,460	12,926	0.0754	0.9246	53.38
47.5	147,961	1,339	0.0091	0.9909	49.36
48.5	132,868	53	0.0004	0.9996	48.91
49.5	107,778	1,999	0.0185	0.9815	48.89
50.5	86,849	5,644	0.0650	0.9350	47.98
51.5	69,393	38	0.0005	0.9995	44.87
52.5	59,484	1,362	0.0229	0.9771	44.84
53.5	49,608	992	0.0200	0.9800	43.81
54.5	42,715	3,194	0.0748	0.9252	42.94
55.5	37,118	4	0.0001	0.9999	39.73
56.5	33,326	1	0.0000	1.0000	39.72
57.5	29,780	4,416	0.1483	0.8517	39.72
58.5	24,514	15,872	0.6475	0.3525	33.83
59.5	7,437	1,824	0.2453	0.7547	11.93
60.5	7,367		0.0000	1.0000	9.00
61.5	5,757	447	0.0776	0.9224	9.00
62.5	4,927	12	0.0024	0.9976	8.30
63.5	4,915	1,109	0.2257	0.7743	8.28
64.5	3,806	1,193	0.3135	0.6865	6.41
65.5	659		0.0000	1.0000	4.40
66.5	659		0.0000	1.0000	4.40
67.5	659		0.0000	1.0000	4.40
68.5	659		0.0000	1.0000	4.40
69.5	431	431	1.0000		4.40
70.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1935-2017			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	2,719,568	165	0.0001	0.9999	100.00
0.5	2,757,776	759	0.0003	0.9997	99.99
1.5	2,721,779	911	0.0003	0.9997	99.97
2.5	2,748,090	400	0.0001	0.9999	99.93
3.5	1,985,772	893	0.0004	0.9996	99.92
4.5	1,848,227	26,153	0.0142	0.9858	99.87
5.5	1,717,745	1,192	0.0007	0.9993	98.46
6.5	1,558,501	540	0.0003	0.9997	98.39
7.5	957,197	690	0.0007	0.9993	98.36
8.5	988,523	1,153	0.0012	0.9988	98.29
9.5	886,180	972	0.0011	0.9989	98.17
10.5	1,025,649	3,530	0.0034	0.9966	98.06
11.5	1,053,296	2,362	0.0022	0.9978	97.73
12.5	1,209,791	4,134	0.0034	0.9966	97.51
13.5	1,247,395	8,937	0.0072	0.9928	97.17
14.5	1,301,981	2,371	0.0018	0.9982	96.48
15.5	1,378,739	3,715	0.0027	0.9973	96.30
16.5	1,559,898	6,134	0.0039	0.9961	96.04
17.5	1,572,519	5,513	0.0035	0.9965	95.67
18.5	1,704,843	6,335	0.0037	0.9963	95.33
19.5	1,740,802	3,199	0.0018	0.9982	94.98
20.5	1,698,070	3,505	0.0021	0.9979	94.80
21.5	1,662,011	4,094	0.0025	0.9975	94.61
22.5	1,626,636	1,194	0.0007	0.9993	94.37
23.5	1,544,441	1,105	0.0007	0.9993	94.30
24.5	1,428,853	5,339	0.0037	0.9963	94.24
25.5	1,303,257	3,963	0.0030	0.9970	93.88
26.5	1,064,896	3,539	0.0033	0.9967	93.60
27.5	1,008,940	1,736	0.0017	0.9983	93.29
28.5	1,119,285	29,991	0.0268	0.9732	93.13
29.5	998,061	2,923	0.0029	0.9971	90.63
30.5	841,683	6,949	0.0083	0.9917	90.37
31.5	714,000	1,927	0.0027	0.9973	89.62
32.5	604,182	5,715	0.0095	0.9905	89.38
33.5	597,440	2,589	0.0043	0.9957	88.53
34.5	524,372	2,807	0.0054	0.9946	88.15
35.5	527,445	8,332	0.0158	0.9842	87.68
36.5	515,802	4,228	0.0082	0.9918	86.29
37.5	538,617	2,433	0.0045	0.9955	85.59
38.5	459,169	1,460	0.0032	0.9968	85.20

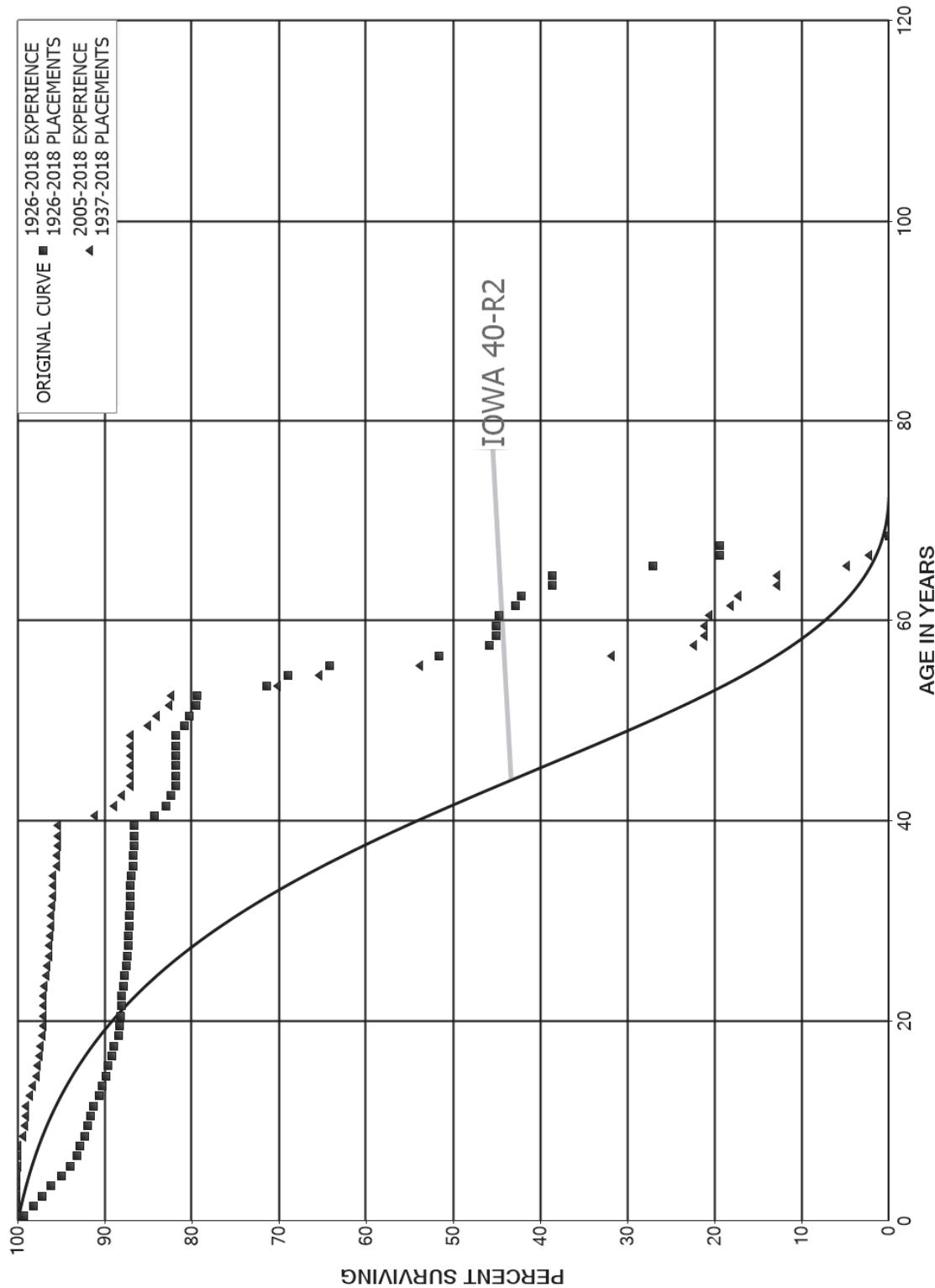
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1935-2017			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	434,994	1,298	0.0030	0.9970	84.93
40.5	389,005	4,170	0.0107	0.9893	84.67
41.5	369,446	2,183	0.0059	0.9941	83.77
42.5	154,246	863	0.0056	0.9944	83.27
43.5	160,250	10,161	0.0634	0.9366	82.81
44.5	133,526	12,400	0.0929	0.9071	77.56
45.5	127,032	7,269	0.0572	0.9428	70.35
46.5	131,749	12,926	0.0981	0.9019	66.33
47.5	109,313	1,339	0.0123	0.9877	59.82
48.5	94,219	53	0.0006	0.9994	59.09
49.5	71,109	1,999	0.0281	0.9719	59.05
50.5	55,784	5,644	0.1012	0.8988	57.39
51.5	38,328	38	0.0010	0.9990	51.59
52.5	29,768	1,362	0.0458	0.9542	51.54
53.5	20,882	992	0.0475	0.9525	49.18
54.5	17,183	3,194	0.1859	0.8141	46.84
55.5	11,814	4	0.0003	0.9997	38.13
56.5	8,023	1	0.0001	0.9999	38.12
57.5	8,904	4,416	0.4960	0.5040	38.12
58.5	19,510	15,872	0.8135	0.1865	19.21
59.5	4,257	1,824	0.4285	0.5715	3.58
60.5	4,187		0.0000	1.0000	2.05
61.5	3,024	447	0.1478	0.8522	2.05
62.5	2,194	12	0.0053	0.9947	1.74
63.5	3,291	1,109	0.3370	0.6630	1.74
64.5	3,376	1,193	0.3535	0.6465	1.15
65.5	228		0.0000	1.0000	0.74
66.5	228		0.0000	1.0000	0.74
67.5	228		0.0000	1.0000	0.74
68.5	228		0.0000	1.0000	0.74
69.5	431	431	1.0000		0.74
70.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	3,813,399	25,413	0.0067	0.9933	100.00
0.5	3,754,462	43,300	0.0115	0.9885	99.33
1.5	3,713,565	39,406	0.0106	0.9894	98.19
2.5	3,588,204	37,758	0.0105	0.9895	97.15
3.5	2,592,998	32,415	0.0125	0.9875	96.12
4.5	2,470,987	25,295	0.0102	0.9898	94.92
5.5	2,381,884	18,318	0.0077	0.9923	93.95
6.5	2,392,150	10,329	0.0043	0.9957	93.23
7.5	2,314,501	12,130	0.0052	0.9948	92.83
8.5	2,295,418	9,590	0.0042	0.9958	92.34
9.5	2,260,960	8,051	0.0036	0.9964	91.95
10.5	2,044,750	8,829	0.0043	0.9957	91.63
11.5	2,013,420	13,125	0.0065	0.9935	91.23
12.5	1,984,137	7,705	0.0039	0.9961	90.64
13.5	1,918,081	10,358	0.0054	0.9946	90.28
14.5	1,881,066	4,886	0.0026	0.9974	89.80
15.5	1,861,042	8,071	0.0043	0.9957	89.56
16.5	1,833,495	4,890	0.0027	0.9973	89.17
17.5	1,746,860	10,259	0.0059	0.9941	88.94
18.5	1,725,663	3,472	0.0020	0.9980	88.41
19.5	1,669,661	1,428	0.0009	0.9991	88.24
20.5	1,637,115	1,076	0.0007	0.9993	88.16
21.5	1,552,663	944	0.0006	0.9994	88.10
22.5	1,516,125	2,856	0.0019	0.9981	88.05
23.5	1,500,938	3,583	0.0024	0.9976	87.88
24.5	1,472,214	2,362	0.0016	0.9984	87.67
25.5	1,138,796	2,138	0.0019	0.9981	87.53
26.5	942,347	550	0.0006	0.9994	87.37
27.5	766,855	451	0.0006	0.9994	87.32
28.5	679,959	588	0.0009	0.9991	87.27
29.5	517,159	170	0.0003	0.9997	87.19
30.5	511,332	530	0.0010	0.9990	87.16
31.5	389,475	222	0.0006	0.9994	87.07
32.5	293,009	6	0.0000	1.0000	87.02
33.5	280,198	124	0.0004	0.9996	87.02
34.5	277,050	957	0.0035	0.9965	86.98
35.5	272,359	19	0.0001	0.9999	86.68
36.5	231,614	178	0.0008	0.9992	86.68
37.5	167,119	23	0.0001	0.9999	86.61
38.5	118,390	20	0.0002	0.9998	86.60

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	75,645	2,053	0.0271	0.9729	86.58
40.5	64,338	991	0.0154	0.9846	84.23
41.5	56,022	351	0.0063	0.9937	82.93
42.5	47,817	315	0.0066	0.9934	82.41
43.5	45,064		0.0000	1.0000	81.87
44.5	45,064	0	0.0000	1.0000	81.87
45.5	44,711		0.0000	1.0000	81.87
46.5	44,711	1	0.0000	1.0000	81.87
47.5	43,505	2	0.0000	1.0000	81.87
48.5	40,203	511	0.0127	0.9873	81.87
49.5	39,692	265	0.0067	0.9933	80.83
50.5	38,336	360	0.0094	0.9906	80.29
51.5	37,976	71	0.0019	0.9981	79.53
52.5	37,905	3,835	0.1012	0.8988	79.38
53.5	22,564	762	0.0338	0.9662	71.35
54.5	16,744	1,145	0.0684	0.9316	68.94
55.5	14,254	2,790	0.1957	0.8043	64.23
56.5	10,142	1,133	0.1117	0.8883	51.66
57.5	9,010	156	0.0173	0.9827	45.89
58.5	8,854		0.0000	1.0000	45.09
59.5	8,854	77	0.0087	0.9913	45.09
60.5	8,777	364	0.0415	0.9585	44.70
61.5	8,413	126	0.0149	0.9851	42.85
62.5	7,394	632	0.0854	0.9146	42.21
63.5	6,403	0	0.0000	1.0000	38.60
64.5	6,054	1,800	0.2974	0.7026	38.60
65.5	4,209	1,193	0.2835	0.7165	27.12
66.5	1,979		0.0000	1.0000	19.43
67.5	1,979	1,979	1.0000		19.43
68.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

ORIGINAL LIFE TABLE

PLACEMENT BAND 1937-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	1,671,437	98	0.0001	0.9999	100.00
0.5	1,664,581	101	0.0001	0.9999	99.99
1.5	1,682,087	87	0.0001	0.9999	99.99
2.5	1,600,079	328	0.0002	0.9998	99.98
3.5	724,487	436	0.0006	0.9994	99.96
4.5	645,456	82	0.0001	0.9999	99.90
5.5	582,413	13	0.0000	1.0000	99.89
6.5	642,328	234	0.0004	0.9996	99.89
7.5	662,228	4,047	0.0061	0.9939	99.85
8.5	688,382	1,553	0.0023	0.9977	99.24
9.5	674,412	188	0.0003	0.9997	99.02
10.5	491,476	268	0.0005	0.9995	98.99
11.5	806,623	3,833	0.0048	0.9952	98.94
12.5	983,484	2,481	0.0025	0.9975	98.47
13.5	1,101,512	5,368	0.0049	0.9951	98.22
14.5	1,157,303	1,341	0.0012	0.9988	97.74
15.5	1,305,870	2,765	0.0021	0.9979	97.62
16.5	1,289,394	1,306	0.0010	0.9990	97.42
17.5	1,330,244	2,737	0.0021	0.9979	97.32
18.5	1,415,060	2,205	0.0016	0.9984	97.12
19.5	1,373,459	336	0.0002	0.9998	96.97
20.5	1,345,115	118	0.0001	0.9999	96.94
21.5	1,265,471	130	0.0001	0.9999	96.94
22.5	1,271,884	1,395	0.0011	0.9989	96.93
23.5	1,324,930	2,435	0.0018	0.9982	96.82
24.5	1,348,113	2,167	0.0016	0.9984	96.64
25.5	1,059,604	2,050	0.0019	0.9981	96.49
26.5	872,973	545	0.0006	0.9994	96.30
27.5	705,227	449	0.0006	0.9994	96.24
28.5	627,186	588	0.0009	0.9991	96.18
29.5	466,992	170	0.0004	0.9996	96.09
30.5	461,166	530	0.0011	0.9989	96.05
31.5	339,842	222	0.0007	0.9993	95.94
32.5	243,375	6	0.0000	1.0000	95.88
33.5	231,893	124	0.0005	0.9995	95.88
34.5	233,003	957	0.0041	0.9959	95.83
35.5	228,312	19	0.0001	0.9999	95.43
36.5	188,805	178	0.0009	0.9991	95.43
37.5	124,311	23	0.0002	0.9998	95.34
38.5	75,581	20	0.0003	0.9997	95.32

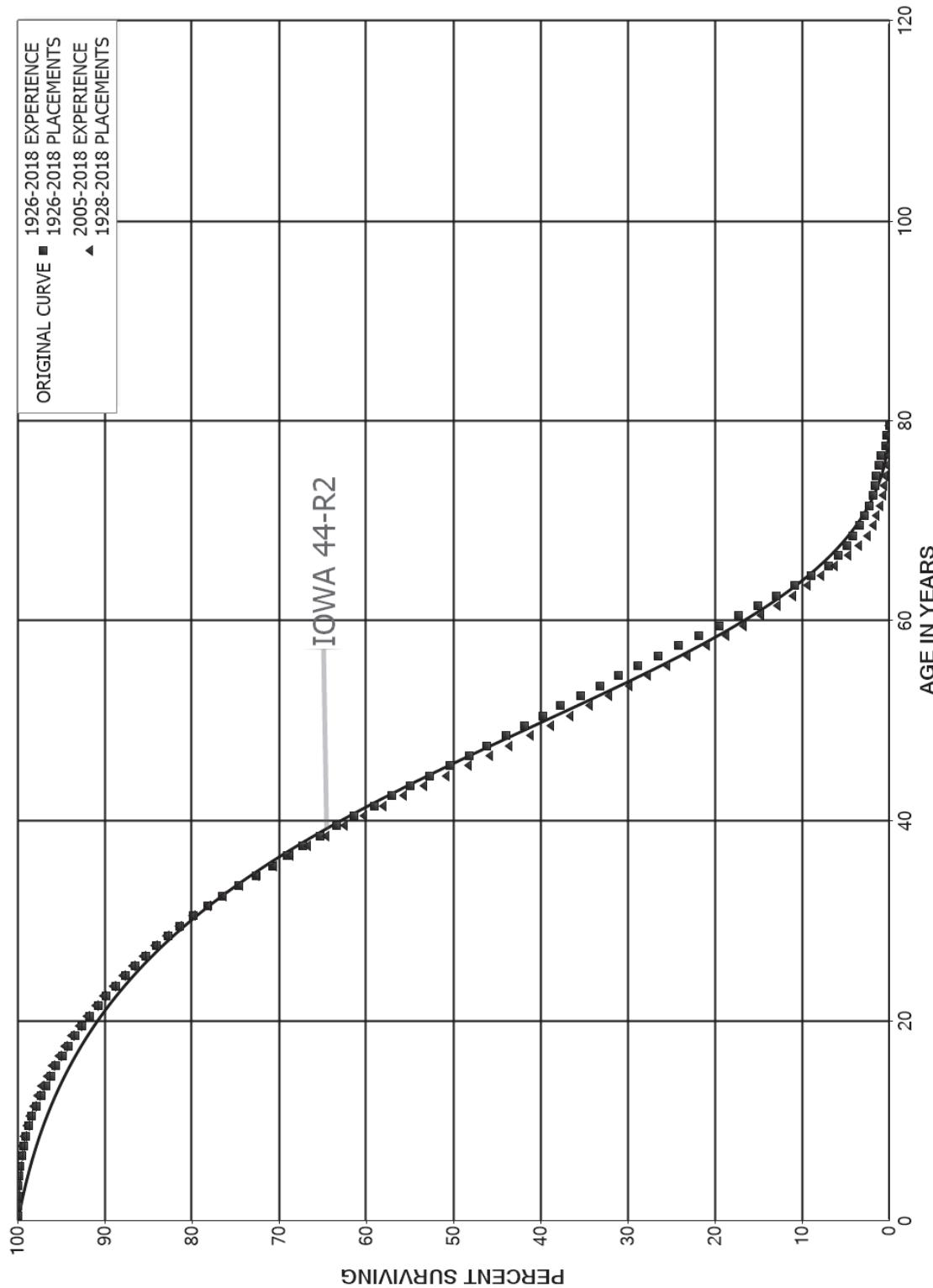
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1937-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	46,397	2,053	0.0442	0.9558	95.29
40.5	41,138	991	0.0241	0.9759	91.08
41.5	34,789	351	0.0101	0.9899	88.88
42.5	28,220	315	0.0112	0.9888	87.98
43.5	25,468		0.0000	1.0000	87.00
44.5	25,468	0	0.0000	1.0000	87.00
45.5	25,114		0.0000	1.0000	87.00
46.5	25,114	1	0.0000	1.0000	87.00
47.5	23,908	2	0.0001	0.9999	87.00
48.5	22,011	511	0.0232	0.9768	86.99
49.5	22,124	265	0.0120	0.9880	84.97
50.5	21,477	360	0.0167	0.9833	83.95
51.5	21,233	71	0.0034	0.9966	82.55
52.5	25,754	3,835	0.1489	0.8511	82.27
53.5	11,172	762	0.0682	0.9318	70.02
54.5	6,497	1,145	0.1763	0.8237	65.24
55.5	6,796	2,790	0.4105	0.5895	53.74
56.5	3,817	1,133	0.2968	0.7032	31.68
57.5	2,840	156	0.0549	0.9451	22.28
58.5	2,684		0.0000	1.0000	21.06
59.5	2,761	77	0.0279	0.9721	21.06
60.5	3,048	364	0.1194	0.8806	20.47
61.5	2,809	126	0.0447	0.9553	18.02
62.5	2,421	632	0.2608	0.7392	17.22
63.5	1,431	0	0.0002	0.9998	12.73
64.5	2,882	1,800	0.6247	0.3753	12.73
65.5	2,230	1,193	0.5352	0.4648	4.78
66.5					2.22
67.5	1,979	1,979	1.0000		
68.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 380.00 SERVICES
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	90,916,174	449	0.0000	1.0000	100.00
0.5	88,100,132	7,764	0.0001	0.9999	100.00
1.5	83,204,738	20,896	0.0003	0.9997	99.99
2.5	77,674,383	38,035	0.0005	0.9995	99.97
3.5	70,560,021	54,665	0.0008	0.9992	99.92
4.5	67,179,998	82,201	0.0012	0.9988	99.84
5.5	63,851,437	108,119	0.0017	0.9983	99.72
6.5	61,804,127	136,426	0.0022	0.9978	99.55
7.5	59,337,005	142,169	0.0024	0.9976	99.33
8.5	57,919,129	189,906	0.0033	0.9967	99.09
9.5	53,915,006	228,117	0.0042	0.9958	98.77
10.5	52,330,509	269,412	0.0051	0.9949	98.35
11.5	50,444,499	277,765	0.0055	0.9945	97.84
12.5	44,676,271	254,726	0.0057	0.9943	97.30
13.5	42,820,859	255,995	0.0060	0.9940	96.75
14.5	39,467,113	240,937	0.0061	0.9939	96.17
15.5	37,499,704	277,494	0.0074	0.9926	95.58
16.5	33,782,229	258,751	0.0077	0.9923	94.88
17.5	30,589,687	249,312	0.0082	0.9918	94.15
18.5	28,024,065	242,747	0.0087	0.9913	93.38
19.5	25,773,154	234,753	0.0091	0.9909	92.57
20.5	23,161,890	245,895	0.0106	0.9894	91.73
21.5	20,009,002	211,990	0.0106	0.9894	90.76
22.5	17,321,018	203,957	0.0118	0.9882	89.79
23.5	12,412,026	154,695	0.0125	0.9875	88.74
24.5	10,580,617	137,010	0.0129	0.9871	87.63
25.5	9,243,163	125,573	0.0136	0.9864	86.50
26.5	8,055,549	118,995	0.0148	0.9852	85.32
27.5	6,875,585	106,137	0.0154	0.9846	84.06
28.5	5,733,842	96,171	0.0168	0.9832	82.76
29.5	4,495,578	83,245	0.0185	0.9815	81.37
30.5	3,720,455	76,530	0.0206	0.9794	79.87
31.5	3,236,214	73,376	0.0227	0.9773	78.22
32.5	2,930,638	72,247	0.0247	0.9753	76.45
33.5	2,702,050	70,680	0.0262	0.9738	74.57
34.5	2,470,418	63,046	0.0255	0.9745	72.62
35.5	2,273,404	55,441	0.0244	0.9756	70.76
36.5	2,114,828	55,062	0.0260	0.9740	69.04
37.5	1,930,516	56,837	0.0294	0.9706	67.24
38.5	1,732,582	50,555	0.0292	0.9708	65.26

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	1,571,005	48,435	0.0308	0.9692	63.36
40.5	1,378,671	52,225	0.0379	0.9621	61.40
41.5	1,229,174	42,176	0.0343	0.9657	59.08
42.5	1,101,413	39,817	0.0362	0.9638	57.05
43.5	987,449	40,287	0.0408	0.9592	54.99
44.5	882,356	38,584	0.0437	0.9563	52.74
45.5	792,186	34,897	0.0441	0.9559	50.44
46.5	720,439	30,929	0.0429	0.9571	48.22
47.5	675,233	31,781	0.0471	0.9529	46.15
48.5	634,107	30,519	0.0481	0.9519	43.97
49.5	581,683	29,080	0.0500	0.9500	41.86
50.5	534,400	27,897	0.0522	0.9478	39.76
51.5	473,954	29,025	0.0612	0.9388	37.69
52.5	424,813	26,284	0.0619	0.9381	35.38
53.5	381,567	24,281	0.0636	0.9364	33.19
54.5	339,987	24,435	0.0719	0.9281	31.08
55.5	279,500	22,772	0.0815	0.9185	28.85
56.5	243,836	21,802	0.0894	0.9106	26.50
57.5	212,825	20,588	0.0967	0.9033	24.13
58.5	182,723	19,046	0.1042	0.8958	21.79
59.5	155,833	18,122	0.1163	0.8837	19.52
60.5	132,044	16,960	0.1284	0.8716	17.25
61.5	110,543	15,466	0.1399	0.8601	15.04
62.5	86,824	13,795	0.1589	0.8411	12.93
63.5	67,096	12,145	0.1810	0.8190	10.88
64.5	50,680	11,022	0.2175	0.7825	8.91
65.5	35,163	5,878	0.1672	0.8328	6.97
66.5	28,298	4,590	0.1622	0.8378	5.81
67.5	23,709	3,516	0.1483	0.8517	4.86
68.5	20,254	3,567	0.1761	0.8239	4.14
69.5	19,034	3,222	0.1693	0.8307	3.41
70.5	17,136	3,501	0.2043	0.7957	2.84
71.5	13,635	2,825	0.2072	0.7928	2.26
72.5	10,810	993	0.0918	0.9082	1.79
73.5	9,817	902	0.0918	0.9082	1.62
74.5	9,003	1,739	0.1932	0.8068	1.48
75.5	7,264	1,189	0.1637	0.8363	1.19
76.5	6,075	3,737	0.6151	0.3849	1.00
77.5	5,651	1,235	0.2185	0.7815	0.38
78.5	4,416	4,416	1.0000		0.30
79.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

ORIGINAL LIFE TABLE

PLACEMENT BAND 1928-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	46,585,180	182	0.0000	1.0000	100.00
0.5	46,914,987	3,075	0.0001	0.9999	100.00
1.5	43,814,891	9,445	0.0002	0.9998	99.99
2.5	41,888,171	18,464	0.0004	0.9996	99.97
3.5	37,879,512	25,802	0.0007	0.9993	99.93
4.5	36,984,245	42,823	0.0012	0.9988	99.86
5.5	35,841,990	55,083	0.0015	0.9985	99.74
6.5	36,410,701	72,483	0.0020	0.9980	99.59
7.5	37,187,991	83,474	0.0022	0.9978	99.39
8.5	38,561,231	111,993	0.0029	0.9971	99.17
9.5	39,878,458	152,482	0.0038	0.9962	98.88
10.5	40,260,781	164,066	0.0041	0.9959	98.50
11.5	39,848,028	189,646	0.0048	0.9952	98.10
12.5	35,392,029	182,999	0.0052	0.9948	97.63
13.5	34,842,183	204,762	0.0059	0.9941	97.13
14.5	32,759,764	203,800	0.0062	0.9938	96.56
15.5	32,188,141	245,143	0.0076	0.9924	95.96
16.5	29,337,404	232,918	0.0079	0.9921	95.23
17.5	26,668,203	225,431	0.0085	0.9915	94.47
18.5	24,417,105	217,335	0.0089	0.9911	93.67
19.5	22,389,090	208,088	0.0093	0.9907	92.84
20.5	20,009,479	217,283	0.0109	0.9891	91.98
21.5	17,058,162	180,558	0.0106	0.9894	90.98
22.5	14,537,308	172,195	0.0118	0.9882	90.01
23.5	9,832,432	123,899	0.0126	0.9874	88.95
24.5	8,222,233	108,264	0.0132	0.9868	87.83
25.5	7,068,824	98,148	0.0139	0.9861	86.67
26.5	6,118,390	94,280	0.0154	0.9846	85.47
27.5	5,104,267	81,878	0.0160	0.9840	84.15
28.5	4,116,859	72,363	0.0176	0.9824	82.80
29.5	3,018,648	58,026	0.0192	0.9808	81.35
30.5	2,371,377	50,698	0.0214	0.9786	79.78
31.5	2,001,113	45,717	0.0228	0.9772	78.08
32.5	1,787,732	44,563	0.0249	0.9751	76.29
33.5	1,615,639	41,158	0.0255	0.9745	74.39
34.5	1,431,531	38,333	0.0268	0.9732	72.50
35.5	1,300,134	36,181	0.0278	0.9722	70.55
36.5	1,197,574	34,111	0.0285	0.9715	68.59
37.5	1,093,986	34,892	0.0319	0.9681	66.64
38.5	958,518	31,488	0.0329	0.9671	64.51

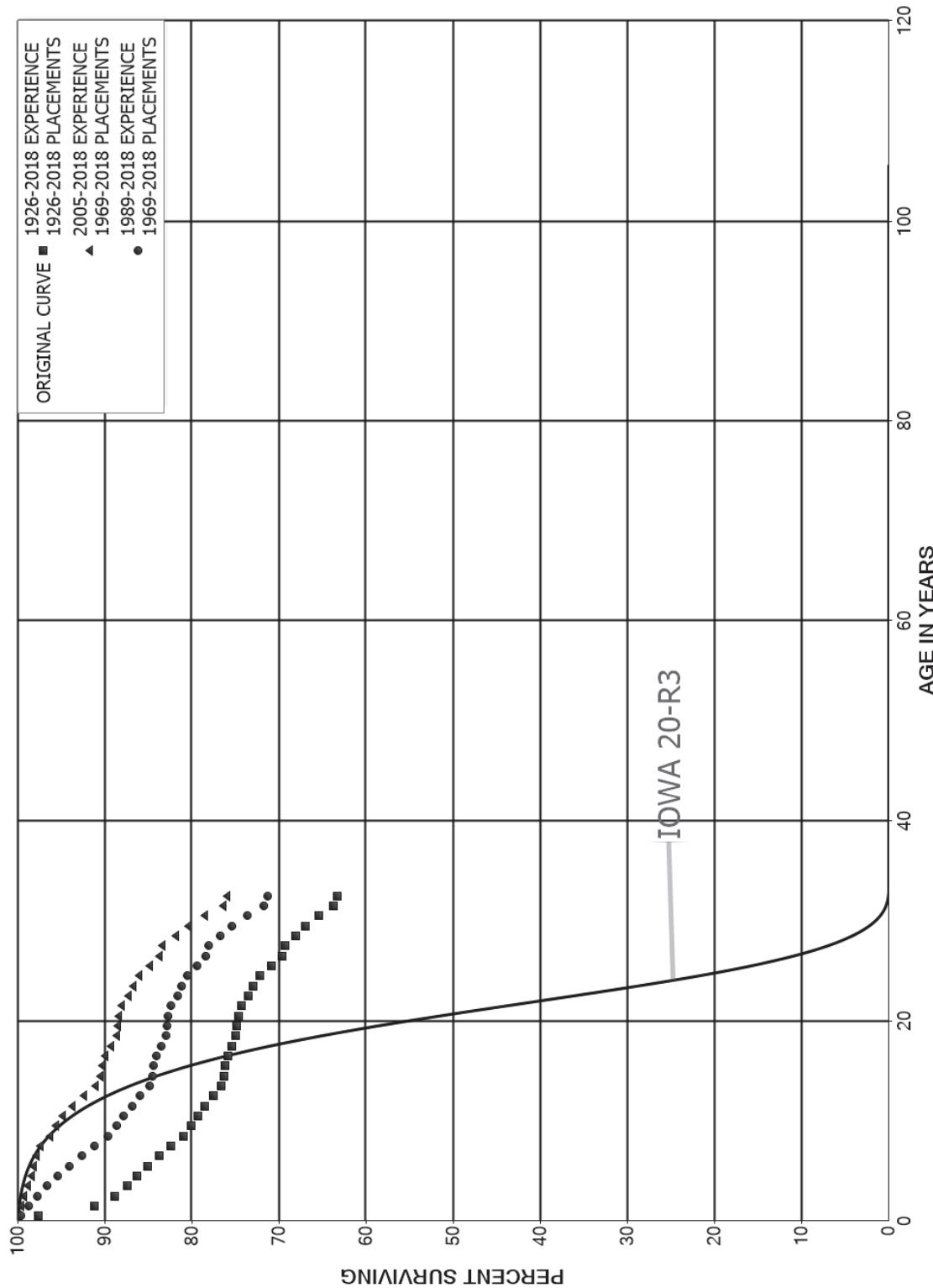
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1928-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	846,569	30,290	0.0358	0.9642	62.39
40.5	701,982	25,596	0.0365	0.9635	60.16
41.5	651,037	26,374	0.0405	0.9595	57.97
42.5	566,623	23,878	0.0421	0.9579	55.62
43.5	489,183	23,808	0.0487	0.9513	53.27
44.5	421,729	20,602	0.0489	0.9511	50.68
45.5	370,088	18,666	0.0504	0.9496	48.21
46.5	333,199	16,512	0.0496	0.9504	45.77
47.5	316,623	17,789	0.0562	0.9438	43.51
48.5	312,853	17,994	0.0575	0.9425	41.06
49.5	297,236	16,947	0.0570	0.9430	38.70
50.5	285,443	17,045	0.0597	0.9403	36.49
51.5	255,271	16,329	0.0640	0.9360	34.31
52.5	238,528	17,601	0.0738	0.9262	32.12
53.5	224,817	16,028	0.0713	0.9287	29.75
54.5	210,860	16,854	0.0799	0.9201	27.63
55.5	174,009	15,904	0.0914	0.9086	25.42
56.5	155,587	15,477	0.0995	0.9005	23.10
57.5	139,187	14,521	0.1043	0.8957	20.80
58.5	121,991	13,197	0.1082	0.8918	18.63
59.5	104,061	12,466	0.1198	0.8802	16.61
60.5	87,782	11,464	0.1306	0.8694	14.62
61.5	72,307	10,134	0.1402	0.8598	12.71
62.5	56,127	8,619	0.1536	0.8464	10.93
63.5	43,843	7,391	0.1686	0.8314	9.25
64.5	33,293	6,757	0.2029	0.7971	7.69
65.5	23,912	5,878	0.2458	0.7542	6.13
66.5	17,048	4,590	0.2692	0.7308	4.62
67.5	12,554	3,516	0.2801	0.7199	3.38
68.5	12,801	3,567	0.2786	0.7214	2.43
69.5	13,674	3,222	0.2356	0.7644	1.76
70.5	11,776	3,501	0.2973	0.7027	1.34
71.5	8,275	2,825	0.3413	0.6587	0.94
72.5	5,451	993	0.1821	0.8179	0.62
73.5	4,595	902	0.1962	0.8038	0.51
74.5	3,782	1,739	0.4599	0.5401	0.41
75.5	2,042	1,189	0.5823	0.4177	0.22
76.5	6,075	3,737	0.6151	0.3849	0.09
77.5	5,651	1,235	0.2185	0.7815	0.04
78.5	4,416	4,416	1.0000		0.03
79.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 381.00 METERS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2018

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	27,351,570	648,843	0.0237	0.9763	100.00
0.5	24,383,978	1,599,803	0.0656	0.9344	97.63
1.5	19,814,475	512,082	0.0258	0.9742	91.22
2.5	18,381,337	307,531	0.0167	0.9833	88.86
3.5	16,949,725	213,152	0.0126	0.9874	87.38
4.5	12,972,107	187,012	0.0144	0.9856	86.28
5.5	11,996,551	185,080	0.0154	0.9846	85.04
6.5	10,810,631	173,331	0.0160	0.9840	83.72
7.5	10,871,448	185,710	0.0171	0.9829	82.38
8.5	10,246,989	113,467	0.0111	0.9889	80.97
9.5	9,555,926	89,937	0.0094	0.9906	80.08
10.5	9,412,456	103,271	0.0110	0.9890	79.32
11.5	8,915,524	103,625	0.0116	0.9884	78.45
12.5	8,768,238	101,356	0.0116	0.9884	77.54
13.5	9,462,822	41,858	0.0044	0.9956	76.65
14.5	9,254,673	19,090	0.0021	0.9979	76.31
15.5	9,336,047	31,740	0.0034	0.9966	76.15
16.5	8,849,041	53,443	0.0060	0.9940	75.89
17.5	8,885,184	61,347	0.0069	0.9931	75.43
18.5	8,659,339	13,759	0.0016	0.9984	74.91
19.5	8,687,439	20,368	0.0023	0.9977	74.79
20.5	8,233,641	38,581	0.0047	0.9953	74.62
21.5	8,260,581	85,964	0.0104	0.9896	74.27
22.5	8,049,980	61,518	0.0076	0.9924	73.49
23.5	7,615,849	81,310	0.0107	0.9893	72.93
24.5	6,541,957	119,014	0.0182	0.9818	72.15
25.5	6,138,773	105,756	0.0172	0.9828	70.84
26.5	3,920,329	17,916	0.0046	0.9954	69.62
27.5	3,646,160	63,229	0.0173	0.9827	69.30
28.5	3,254,272	55,294	0.0170	0.9830	68.10
29.5	3,037,881	72,545	0.0239	0.9761	66.94
30.5	2,161,087	54,374	0.0252	0.9748	65.34
31.5	1,085,101	7,069	0.0065	0.9935	63.70
32.5	901,448	16,503	0.0183	0.9817	63.29
33.5	644,204	14,168	0.0220	0.9780	62.13
34.5	577,990	9,709	0.0168	0.9832	60.76
35.5	517,227	31,104	0.0601	0.9399	59.74
36.5	429,752	10,692	0.0249	0.9751	56.15
37.5	326,827	5,501	0.0168	0.9832	54.75
38.5	247,553	3,156	0.0127	0.9873	53.83

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	209,472	10,674	0.0510	0.9490	53.14
40.5	137,511	5,140	0.0374	0.9626	50.43
41.5	100,968	476	0.0047	0.9953	48.55
42.5	85,509	41	0.0005	0.9995	48.32
43.5	76,604	297	0.0039	0.9961	48.30
44.5	56,047	3,436	0.0613	0.9387	48.11
45.5	52,612	136	0.0026	0.9974	45.16
46.5	52,476	811	0.0154	0.9846	45.04
47.5	51,665	1,454	0.0281	0.9719	44.35
48.5	50,211	4,455	0.0887	0.9113	43.10
49.5					39.28

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1969-2018

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	18,141,314	24,253	0.0013	0.9987	100.00
0.5	16,396,789	64,570	0.0039	0.9961	99.87
1.5	13,362,520	42,818	0.0032	0.9968	99.47
2.5	12,398,647	51,416	0.0041	0.9959	99.15
3.5	11,223,150	50,165	0.0045	0.9955	98.74
4.5	7,413,524	19,656	0.0027	0.9973	98.30
5.5	6,605,323	21,220	0.0032	0.9968	98.04
6.5	5,783,438	23,484	0.0041	0.9959	97.73
7.5	5,994,103	72,284	0.0121	0.9879	97.33
8.5	5,483,070	38,262	0.0070	0.9930	96.16
9.5	4,867,211	37,746	0.0078	0.9922	95.48
10.5	5,882,178	68,079	0.0116	0.9884	94.74
11.5	5,420,438	80,906	0.0149	0.9851	93.65
12.5	6,491,408	94,577	0.0146	0.9854	92.25
13.5	7,192,771	39,374	0.0055	0.9945	90.91
14.5	6,987,107	17,450	0.0025	0.9975	90.41
15.5	7,070,121	29,546	0.0042	0.9958	90.18
16.5	7,438,348	52,780	0.0071	0.9929	89.81
17.5	8,548,897	60,605	0.0071	0.9929	89.17
18.5	8,323,795	11,321	0.0014	0.9986	88.54
19.5	8,493,923	15,159	0.0018	0.9982	88.42
20.5	8,045,333	29,728	0.0037	0.9963	88.26
21.5	8,081,126	73,283	0.0091	0.9909	87.93
22.5	7,883,206	44,811	0.0057	0.9943	87.13
23.5	7,465,782	60,365	0.0081	0.9919	86.64
24.5	6,412,835	93,599	0.0146	0.9854	85.94
25.5	6,035,066	75,614	0.0125	0.9875	84.68
26.5	3,846,764	17,916	0.0047	0.9953	83.62
27.5	3,572,595	63,229	0.0177	0.9823	83.23
28.5	3,180,707	55,294	0.0174	0.9826	81.76
29.5	2,964,316	72,545	0.0245	0.9755	80.34
30.5	2,087,522	54,374	0.0260	0.9740	78.37
31.5	1,011,536	7,069	0.0070	0.9930	76.33
32.5	827,883	16,503	0.0199	0.9801	75.80
33.5	570,639	14,168	0.0248	0.9752	74.29
34.5	504,425	9,709	0.0192	0.9808	72.44
35.5	517,227	31,104	0.0601	0.9399	71.05
36.5	429,752	10,692	0.0249	0.9751	66.78
37.5	326,827	5,501	0.0168	0.9832	65.11
38.5	247,553	3,156	0.0127	0.9873	64.02

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1969-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	209,472	10,674	0.0510	0.9490	63.20
40.5	137,511	5,140	0.0374	0.9626	59.98
41.5	100,968	476	0.0047	0.9953	57.74
42.5	85,509	41	0.0005	0.9995	57.47
43.5	76,604	297	0.0039	0.9961	57.44
44.5	56,047	3,436	0.0613	0.9387	57.22
45.5	52,612	136	0.0026	0.9974	53.71
46.5	52,476	811	0.0154	0.9846	53.57
47.5	51,665	1,454	0.0281	0.9719	52.74
48.5	50,211	4,455	0.0887	0.9113	51.26
49.5					46.71

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1969-2018

EXPERIENCE BAND 1989-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	21,889,507	80,403	0.0037	0.9963	100.00
0.5	20,456,260	189,588	0.0093	0.9907	99.63
1.5	18,502,616	184,102	0.0100	0.9900	98.71
2.5	17,587,858	199,743	0.0114	0.9886	97.73
3.5	16,552,690	201,480	0.0122	0.9878	96.62
4.5	12,694,143	183,307	0.0144	0.9856	95.44
5.5	11,762,208	181,620	0.0154	0.9846	94.06
6.5	10,579,748	169,468	0.0160	0.9840	92.61
7.5	10,644,428	181,408	0.0170	0.9830	91.13
8.5	10,024,271	108,691	0.0108	0.9892	89.57
9.5	9,337,984	84,649	0.0091	0.9909	88.60
10.5	9,199,802	97,434	0.0106	0.9894	87.80
11.5	8,708,708	97,201	0.0112	0.9888	86.87
12.5	8,567,845	101,304	0.0118	0.9882	85.90
13.5	9,262,481	41,138	0.0044	0.9956	84.88
14.5	9,055,052	17,657	0.0020	0.9980	84.51
15.5	9,137,859	29,546	0.0032	0.9968	84.34
16.5	8,653,047	53,443	0.0062	0.9938	84.07
17.5	8,689,190	60,605	0.0070	0.9930	83.55
18.5	8,464,088	12,025	0.0014	0.9986	82.97
19.5	8,567,488	15,159	0.0018	0.9982	82.85
20.5	8,118,898	29,728	0.0037	0.9963	82.70
21.5	8,154,691	73,283	0.0090	0.9910	82.40
22.5	7,956,771	44,811	0.0056	0.9944	81.66
23.5	7,539,347	60,365	0.0080	0.9920	81.20
24.5	6,486,400	93,599	0.0144	0.9856	80.55
25.5	6,108,631	75,614	0.0124	0.9876	79.39
26.5	3,920,329	17,916	0.0046	0.9954	78.41
27.5	3,646,160	63,229	0.0173	0.9827	78.05
28.5	3,254,272	55,294	0.0170	0.9830	76.69
29.5	3,037,881	72,545	0.0239	0.9761	75.39
30.5	2,161,087	54,374	0.0252	0.9748	73.59
31.5	1,085,101	7,069	0.0065	0.9935	71.74
32.5	901,448	16,503	0.0183	0.9817	71.27
33.5	644,204	14,168	0.0220	0.9780	69.97
34.5	577,990	9,709	0.0168	0.9832	68.43
35.5	517,227	31,104	0.0601	0.9399	67.28
36.5	429,752	10,692	0.0249	0.9751	63.23
37.5	326,827	5,501	0.0168	0.9832	61.66
38.5	247,553	3,156	0.0127	0.9873	60.62

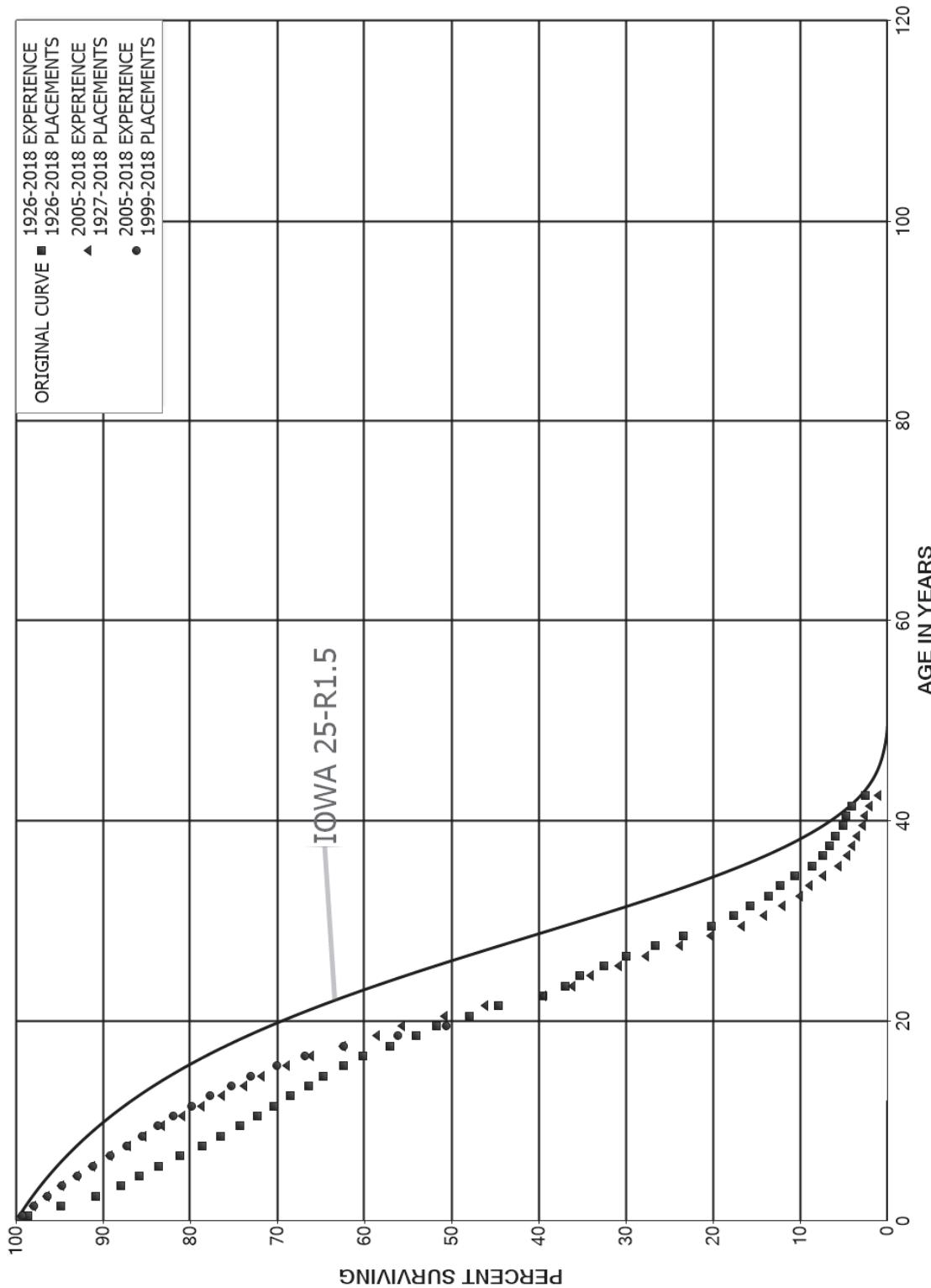
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1969-2018			EXPERIENCE BAND 1989-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	209,472	10,674	0.0510	0.9490	59.85
40.5	137,511	5,140	0.0374	0.9626	56.80
41.5	100,968	476	0.0047	0.9953	54.68
42.5	85,509	41	0.0005	0.9995	54.42
43.5	76,604	297	0.0039	0.9961	54.39
44.5	56,047	3,436	0.0613	0.9387	54.18
45.5	52,612	136	0.0026	0.9974	50.86
46.5	52,476	811	0.0154	0.9846	50.73
47.5	51,665	1,454	0.0281	0.9719	49.94
48.5	50,211	4,455	0.0887	0.9113	48.54
49.5					44.23

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	53,311,633	722,027	0.0135	0.9865	100.00
0.5	50,226,950	1,946,300	0.0388	0.9612	98.65
1.5	45,818,490	1,913,044	0.0418	0.9582	94.82
2.5	41,597,920	1,319,669	0.0317	0.9683	90.86
3.5	37,311,368	897,827	0.0241	0.9759	87.98
4.5	35,377,294	924,604	0.0261	0.9739	85.86
5.5	32,636,342	945,065	0.0290	0.9710	83.62
6.5	29,454,884	940,373	0.0319	0.9681	81.20
7.5	27,209,610	744,003	0.0273	0.9727	78.61
8.5	25,877,917	717,497	0.0277	0.9723	76.46
9.5	22,290,528	607,301	0.0272	0.9728	74.34
10.5	20,501,393	543,857	0.0265	0.9735	72.31
11.5	19,355,165	524,060	0.0271	0.9729	70.39
12.5	16,761,643	517,569	0.0309	0.9691	68.49
13.5	15,827,922	405,196	0.0256	0.9744	66.37
14.5	12,692,105	453,014	0.0357	0.9643	64.67
15.5	11,107,016	399,308	0.0360	0.9640	62.37
16.5	9,126,101	461,684	0.0506	0.9494	60.12
17.5	6,249,984	335,056	0.0536	0.9464	57.08
18.5	4,343,368	181,036	0.0417	0.9583	54.02
19.5	4,056,377	299,339	0.0738	0.9262	51.77
20.5	2,565,651	179,807	0.0701	0.9299	47.95
21.5	2,345,465	265,047	0.1130	0.8870	44.59
22.5	1,966,779	127,517	0.0648	0.9352	39.55
23.5	1,842,052	86,840	0.0471	0.9529	36.99
24.5	1,758,049	134,171	0.0763	0.9237	35.24
25.5	1,605,369	129,958	0.0810	0.9190	32.55
26.5	1,445,714	161,492	0.1117	0.8883	29.92
27.5	1,239,758	150,240	0.1212	0.8788	26.58
28.5	1,095,780	151,530	0.1383	0.8617	23.36
29.5	930,973	114,214	0.1227	0.8773	20.13
30.5	782,291	86,813	0.1110	0.8890	17.66
31.5	672,949	91,272	0.1356	0.8644	15.70
32.5	594,499	54,343	0.0914	0.9086	13.57
33.5	541,591	76,609	0.1415	0.8585	12.33
34.5	455,893	85,993	0.1886	0.8114	10.58
35.5	371,977	51,558	0.1386	0.8614	8.59
36.5	323,934	32,921	0.1016	0.8984	7.40
37.5	293,354	29,274	0.0998	0.9002	6.65
38.5	264,578	40,443	0.1529	0.8471	5.98

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	225,514	13,510	0.0599	0.9401	5.07
40.5	213,917	31,837	0.1488	0.8512	4.76
41.5	184,158	68,320	0.3710	0.6290	4.06
42.5	118,639	12,398	0.1045	0.8955	2.55
43.5	108,750	10,097	0.0928	0.9072	2.28
44.5	99,138	11,073	0.1117	0.8883	2.07
45.5	88,066	14,895	0.1691	0.8309	1.84
46.5	73,290	7,874	0.1074	0.8926	1.53
47.5	65,576	4,928	0.0751	0.9249	1.37
48.5	60,886	3,397	0.0558	0.9442	1.26
49.5	59,015	3,464	0.0587	0.9413	1.19
50.5	56,478	12,956	0.2294	0.7706	1.12
51.5	44,363	4,228	0.0953	0.9047	0.86
52.5	40,655	3,549	0.0873	0.9127	0.78
53.5	37,227	1,678	0.0451	0.9549	0.71
54.5	35,832	442	0.0123	0.9877	0.68
55.5	35,574	205	0.0058	0.9942	0.67
56.5	35,412	1,614	0.0456	0.9544	0.67
57.5	33,912	5,563	0.1640	0.8360	0.64
58.5	28,521	3,169	0.1111	0.8889	0.53
59.5	25,452	2,940	0.1155	0.8845	0.47
60.5	22,523	5,121	0.2273	0.7727	0.42
61.5	17,427	1,716	0.0985	0.9015	0.32
62.5	15,711	2,436	0.1550	0.8450	0.29
63.5	13,275	1,550	0.1167	0.8833	0.25
64.5	11,784	720	0.0611	0.9389	0.22
65.5	11,069	1,764	0.1594	0.8406	0.20
66.5	9,334	2,214	0.2372	0.7628	0.17
67.5	7,121	1,256	0.1764	0.8236	0.13
68.5	6,180	177	0.0287	0.9713	0.11
69.5	6,003	234	0.0390	0.9610	0.11
70.5	5,769	3	0.0005	0.9995	0.10
71.5	5,766	133	0.0231	0.9769	0.10
72.5	5,632	618	0.1097	0.8903	0.10
73.5	5,014	124	0.0248	0.9752	0.09
74.5	4,890	591	0.1208	0.8792	0.09
75.5	4,330		0.0000	1.0000	0.08
76.5	4,330	2,662	0.6149	0.3851	0.08
77.5	1,667	3	0.0016	0.9984	0.03
78.5	1,742	86	0.0494	0.9506	0.03

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	1,656	403	0.2431	0.7569	0.03
80.5	1,253	0	0.0002	0.9998	0.02
81.5	1,253	2	0.0015	0.9985	0.02
82.5	1,251	55	0.0437	0.9563	0.02
83.5	1,196	418	0.3496	0.6504	0.02
84.5	778	4	0.0048	0.9952	0.01
85.5	774	56	0.0727	0.9273	0.01
86.5	718	718	1.0000		0.01
87.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1927-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	27,505,465	197,371	0.0072	0.9928	100.00
0.5	28,101,956	379,595	0.0135	0.9865	99.28
1.5	26,909,821	429,930	0.0160	0.9840	97.94
2.5	26,407,118	461,000	0.0175	0.9825	96.38
3.5	26,734,332	489,740	0.0183	0.9817	94.69
4.5	27,767,292	549,035	0.0198	0.9802	92.96
5.5	25,571,334	542,308	0.0212	0.9788	91.12
6.5	24,955,291	585,372	0.0235	0.9765	89.19
7.5	23,364,792	498,484	0.0213	0.9787	87.10
8.5	23,292,979	574,280	0.0247	0.9753	85.24
9.5	20,246,166	556,321	0.0275	0.9725	83.14
10.5	18,593,005	521,798	0.0281	0.9719	80.85
11.5	17,610,227	512,237	0.0291	0.9709	78.58
12.5	15,128,874	508,169	0.0336	0.9664	76.30
13.5	14,411,235	398,791	0.0277	0.9723	73.73
14.5	11,409,857	450,988	0.0395	0.9605	71.69
15.5	10,018,317	398,853	0.0398	0.9602	68.86
16.5	8,207,055	461,527	0.0562	0.9438	66.12
17.5	5,437,324	334,959	0.0616	0.9384	62.40
18.5	3,622,233	180,968	0.0500	0.9500	58.56
19.5	3,416,327	299,302	0.0876	0.9124	55.63
20.5	1,957,558	179,782	0.0918	0.9082	50.76
21.5	1,835,850	265,036	0.1444	0.8556	46.10
22.5	1,508,263	127,517	0.0845	0.9155	39.44
23.5	1,422,553	86,840	0.0610	0.9390	36.11
24.5	1,417,614	134,171	0.0946	0.9054	33.90
25.5	1,296,185	129,958	0.1003	0.8997	30.69
26.5	1,161,927	161,492	0.1390	0.8610	27.62
27.5	978,226	150,240	0.1536	0.8464	23.78
28.5	877,003	151,530	0.1728	0.8272	20.13
29.5	724,314	114,214	0.1577	0.8423	16.65
30.5	584,456	86,813	0.1485	0.8515	14.02
31.5	552,180	91,272	0.1653	0.8347	11.94
32.5	478,739	54,343	0.1135	0.8865	9.97
33.5	436,241	76,609	0.1756	0.8244	8.84
34.5	357,688	85,993	0.2404	0.7596	7.28
35.5	288,057	51,558	0.1790	0.8210	5.53
36.5	251,479	32,921	0.1309	0.8691	4.54
37.5	224,144	29,274	0.1306	0.8694	3.95
38.5	199,952	40,443	0.2023	0.7977	3.43

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1927-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	163,954	13,510	0.0824	0.9176	2.74
40.5	156,025	31,837	0.2041	0.7959	2.51
41.5	137,474	68,320	0.4970	0.5030	2.00
42.5	77,948	12,398	0.1591	0.8409	1.01
43.5	71,598	10,097	0.1410	0.8590	0.85
44.5	63,751	11,073	0.1737	0.8263	0.73
45.5	53,055	14,895	0.2807	0.7193	0.60
46.5	38,565	7,874	0.2042	0.7958	0.43
47.5	32,424	4,928	0.1520	0.8480	0.34
48.5	33,360	3,397	0.1018	0.8982	0.29
49.5	34,752	3,464	0.0997	0.9003	0.26
50.5	35,335	12,956	0.3667	0.6333	0.24
51.5	27,836	4,228	0.1519	0.8481	0.15
52.5	25,725	3,549	0.1380	0.8620	0.13
53.5	24,459	1,678	0.0686	0.9314	0.11
54.5	24,554	442	0.0180	0.9820	0.10
55.5	24,967	205	0.0082	0.9918	0.10
56.5	26,460	1,614	0.0610	0.9390	0.10
57.5	27,011	5,563	0.2059	0.7941	0.09
58.5	22,778	3,169	0.1391	0.8609	0.07
59.5	19,876	2,940	0.1479	0.8521	0.06
60.5	17,158	5,121	0.2984	0.7016	0.05
61.5	12,061	1,716	0.1423	0.8577	0.04
62.5	10,479	2,436	0.2324	0.7676	0.03
63.5	8,604	1,550	0.1801	0.8199	0.03
64.5	7,232	720	0.0995	0.9005	0.02
65.5	7,070	1,764	0.2496	0.7504	0.02
66.5	5,335	2,214	0.4150	0.5850	0.01
67.5	5,482	1,256	0.2292	0.7708	0.01
68.5	4,541	177	0.0390	0.9610	0.01
69.5	4,450	234	0.0526	0.9474	0.01
70.5	4,621	3	0.0006	0.9994	0.01
71.5	4,618	133	0.0289	0.9711	0.01
72.5	4,484	618	0.1378	0.8622	0.01
73.5	3,921	124	0.0317	0.9683	0.00
74.5	4,188	591	0.1410	0.8590	0.00
75.5	3,627		0.0000	1.0000	0.00
76.5	3,663	2,662	0.7268	0.2732	0.00
77.5	1,667	3	0.0016	0.9984	0.00
78.5	1,742	86	0.0494	0.9506	0.00

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1927-2018

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	1,656	403	0.2431	0.7569	0.00
80.5	1,253	0	0.0002	0.9998	0.00
81.5	1,253	2	0.0015	0.9985	0.00
82.5	1,251	55	0.0437	0.9563	0.00
83.5	1,196	418	0.3496	0.6504	0.00
84.5	778	4	0.0048	0.9952	0.00
85.5	774	56	0.0727	0.9273	0.00
86.5	718	718	1.0000		0.00
87.5					

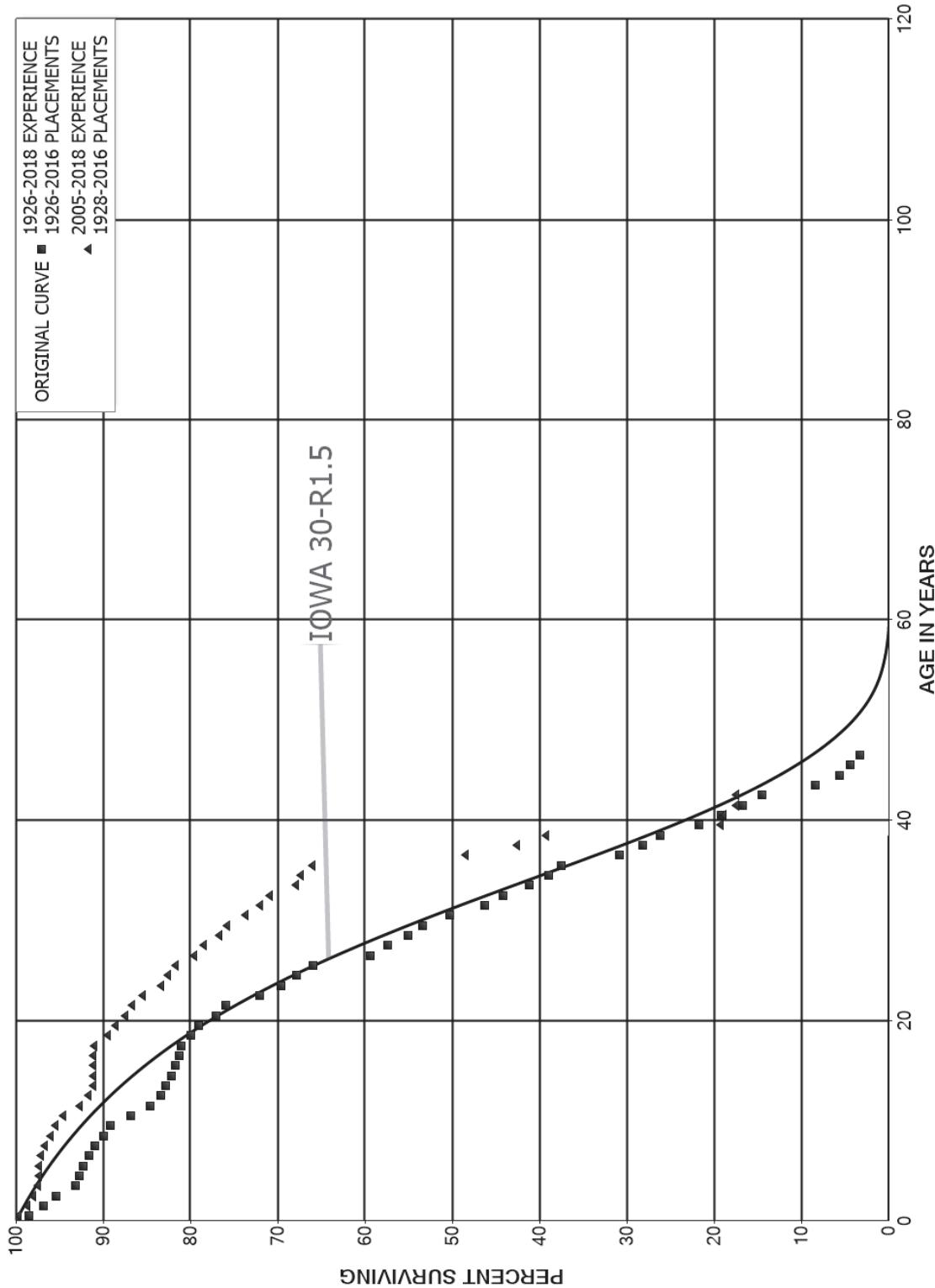
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1999-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	27,505,465	197,371	0.0072	0.9928	100.00
0.5	28,101,956	379,595	0.0135	0.9865	99.28
1.5	26,909,821	429,930	0.0160	0.9840	97.94
2.5	26,407,118	461,000	0.0175	0.9825	96.38
3.5	26,734,332	489,740	0.0183	0.9817	94.69
4.5	27,767,292	549,035	0.0198	0.9802	92.96
5.5	25,571,334	542,308	0.0212	0.9788	91.12
6.5	22,792,634	493,518	0.0217	0.9783	89.19
7.5	20,995,049	421,465	0.0201	0.9799	87.26
8.5	20,019,217	412,770	0.0206	0.9794	85.51
9.5	16,800,840	370,475	0.0221	0.9779	83.74
10.5	15,276,623	374,287	0.0245	0.9755	81.90
11.5	14,303,026	395,601	0.0277	0.9723	79.89
12.5	11,832,306	365,647	0.0309	0.9691	77.68
13.5	11,041,374	327,082	0.0296	0.9704	75.28
14.5	7,979,844	327,651	0.0411	0.9589	73.05
15.5	6,510,927	298,215	0.0458	0.9542	70.05
16.5	4,623,777	310,597	0.0672	0.9328	66.84
17.5	1,893,494	186,166	0.0983	0.9017	62.35
18.5	130,054	13,038	0.1003	0.8997	56.22
19.5					50.59

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2016			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	2,179,864	33,498	0.0154	0.9846	100.00
0.5	2,146,367	34,519	0.0161	0.9839	98.46
1.5	2,111,848	31,405	0.0149	0.9851	96.88
2.5	2,058,433	48,630	0.0236	0.9764	95.44
3.5	1,785,799	9,179	0.0051	0.9949	93.18
4.5	1,665,364	8,019	0.0048	0.9952	92.71
5.5	1,499,095	11,354	0.0076	0.9924	92.26
6.5	1,372,261	9,508	0.0069	0.9931	91.56
7.5	846,355	8,530	0.0101	0.9899	90.93
8.5	786,230	7,362	0.0094	0.9906	90.01
9.5	717,259	18,440	0.0257	0.9743	89.17
10.5	698,441	18,413	0.0264	0.9736	86.87
11.5	675,043	9,298	0.0138	0.9862	84.58
12.5	664,919	4,995	0.0075	0.9925	83.42
13.5	582,639	4,280	0.0073	0.9927	82.79
14.5	434,253	2,248	0.0052	0.9948	82.18
15.5	422,309	2,500	0.0059	0.9941	81.76
16.5	407,727	1,217	0.0030	0.9970	81.27
17.5	111,149	1,439	0.0129	0.9871	81.03
18.5	109,710	1,308	0.0119	0.9881	79.98
19.5	108,402	2,688	0.0248	0.9752	79.03
20.5	105,714	1,483	0.0140	0.9860	77.07
21.5	104,231	5,321	0.0510	0.9490	75.99
22.5	98,910	3,476	0.0351	0.9649	72.11
23.5	95,435	2,343	0.0245	0.9755	69.58
24.5	83,999	2,304	0.0274	0.9726	67.87
25.5	79,887	8,031	0.1005	0.8995	66.01
26.5	68,124	2,223	0.0326	0.9674	59.37
27.5	63,721	2,621	0.0411	0.9589	57.43
28.5	57,598	1,790	0.0311	0.9689	55.07
29.5	44,797	2,556	0.0571	0.9429	53.36
30.5	42,241	3,350	0.0793	0.9207	50.31
31.5	38,452	1,808	0.0470	0.9530	46.33
32.5	28,828	1,917	0.0665	0.9335	44.15
33.5	26,652	1,470	0.0551	0.9449	41.21
34.5	21,410	804	0.0376	0.9624	38.94
35.5	19,959	3,529	0.1768	0.8232	37.48
36.5	14,071	1,198	0.0851	0.9149	30.85
37.5	11,726	848	0.0723	0.9277	28.22
38.5	10,295	1,738	0.1688	0.8312	26.18

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2016

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	7,842	936	0.1193	0.8807	21.76
40.5	6,907	891	0.1290	0.8710	19.17
41.5	5,971	788	0.1320	0.8680	16.69
42.5	4,830	2,015	0.4172	0.5828	14.49
43.5	2,815	936	0.3326	0.6674	8.44
44.5	1,879	422	0.2245	0.7755	5.64
45.5	1,457	362	0.2484	0.7516	4.37
46.5	1,095	447	0.4086	0.5914	3.28
47.5	648	598	0.9240	0.0760	1.94
48.5	49		0.0000	1.0000	0.15
49.5	49		0.0000	1.0000	0.15
50.5	49		0.0000	1.0000	0.15
51.5	49		0.0000	1.0000	0.15
52.5	49		0.0000	1.0000	0.15
53.5	49		0.0000	1.0000	0.15
54.5	49		0.0000	1.0000	0.15
55.5	49		0.0000	1.0000	0.15
56.5	49		0.0000	1.0000	0.15
57.5	49		0.0000	1.0000	0.15
58.5	49		0.0000	1.0000	0.15
59.5	49		0.0000	1.0000	0.15
60.5	49		0.0000	1.0000	0.15
61.5	49		0.0000	1.0000	0.15
62.5	49		0.0000	1.0000	0.15
63.5	49		0.0000	1.0000	0.15
64.5	49		0.0000	1.0000	0.15
65.5	49		0.0000	1.0000	0.15
66.5	49		0.0000	1.0000	0.15
67.5	49		0.0000	1.0000	0.15
68.5	49		0.0000	1.0000	0.15
69.5	49		0.0000	1.0000	0.15
70.5	49		0.0000	1.0000	0.15
71.5	49		0.0000	1.0000	0.15
72.5	49		0.0000	1.0000	0.15
73.5	49		0.0000	1.0000	0.15
74.5	49		0.0000	1.0000	0.15
75.5	49		0.0000	1.0000	0.15
76.5	49		0.0000	1.0000	0.15
77.5	49		0.0000	1.0000	0.15
78.5	49		0.0000	1.0000	0.15

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2016

EXPERIENCE BAND 1926-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	49		0.0000	1.0000	0.15
80.5	49		0.0000	1.0000	0.15
81.5	49	0	0.0022	0.9978	0.15
82.5	49	49	1.0000		0.15
83.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1928-2016			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	1,418,705	5,935	0.0042	0.9958	100.00
0.5	1,563,422	15,328	0.0098	0.9902	99.58
1.5	1,548,094	10,821	0.0070	0.9930	98.61
2.5	1,515,263	7,466	0.0049	0.9951	97.92
3.5	1,604,940	1,853	0.0012	0.9988	97.43
4.5	1,491,831	1,059	0.0007	0.9993	97.32
5.5	1,332,522	2,188	0.0016	0.9984	97.25
6.5	1,214,855	5,426	0.0045	0.9955	97.09
7.5	693,030	5,246	0.0076	0.9924	96.66
8.5	636,189	3,575	0.0056	0.9944	95.93
9.5	571,005	5,451	0.0095	0.9905	95.39
10.5	575,453	11,233	0.0195	0.9805	94.48
11.5	561,293	6,128	0.0109	0.9891	92.63
12.5	558,626	3,474	0.0062	0.9938	91.62
13.5	480,394		0.0000	1.0000	91.05
14.5	340,391		0.0000	1.0000	91.05
15.5	343,734	15	0.0000	1.0000	91.05
16.5	331,638	179	0.0005	0.9995	91.05
17.5	36,633	650	0.0177	0.9823	91.00
18.5	45,627	473	0.0104	0.9896	89.39
19.5	45,480	532	0.0117	0.9883	88.46
20.5	49,772	434	0.0087	0.9913	87.43
21.5	50,184	730	0.0145	0.9855	86.66
22.5	52,616	1,317	0.0250	0.9750	85.40
23.5	53,001	489	0.0092	0.9908	83.27
24.5	44,257	454	0.0103	0.9897	82.50
25.5	43,511	1,143	0.0263	0.9737	81.65
26.5	38,636	515	0.0133	0.9867	79.51
27.5	36,026	842	0.0234	0.9766	78.45
28.5	35,806	409	0.0114	0.9886	76.61
29.5	24,889	696	0.0280	0.9720	75.74
30.5	24,401	551	0.0226	0.9774	73.62
31.5	23,812	386	0.0162	0.9838	71.95
32.5	15,610	653	0.0419	0.9581	70.79
33.5	14,698	126	0.0086	0.9914	67.82
34.5	10,799	215	0.0199	0.9801	67.24
35.5	9,938	2,639	0.2656	0.7344	65.91
36.5	4,940	604	0.1222	0.8778	48.40
37.5	3,189	250	0.0784	0.9216	42.49
38.5	2,356	1,202	0.5102	0.4898	39.16

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1928-2016		EXPERIENCE BAND 2005-2018			
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	439	9	0.0196	0.9804	19.18
40.5	430	33	0.0772	0.9228	18.80
41.5	353		0.0000	1.0000	17.35
42.5					17.35
43.5					
44.5					
45.5					
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68.5					
69.5					
70.5					
71.5					
72.5					
73.5					
74.5					
75.5					
76.5	49		0.0000		
77.5	49		0.0000		
78.5	49		0.0000		

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

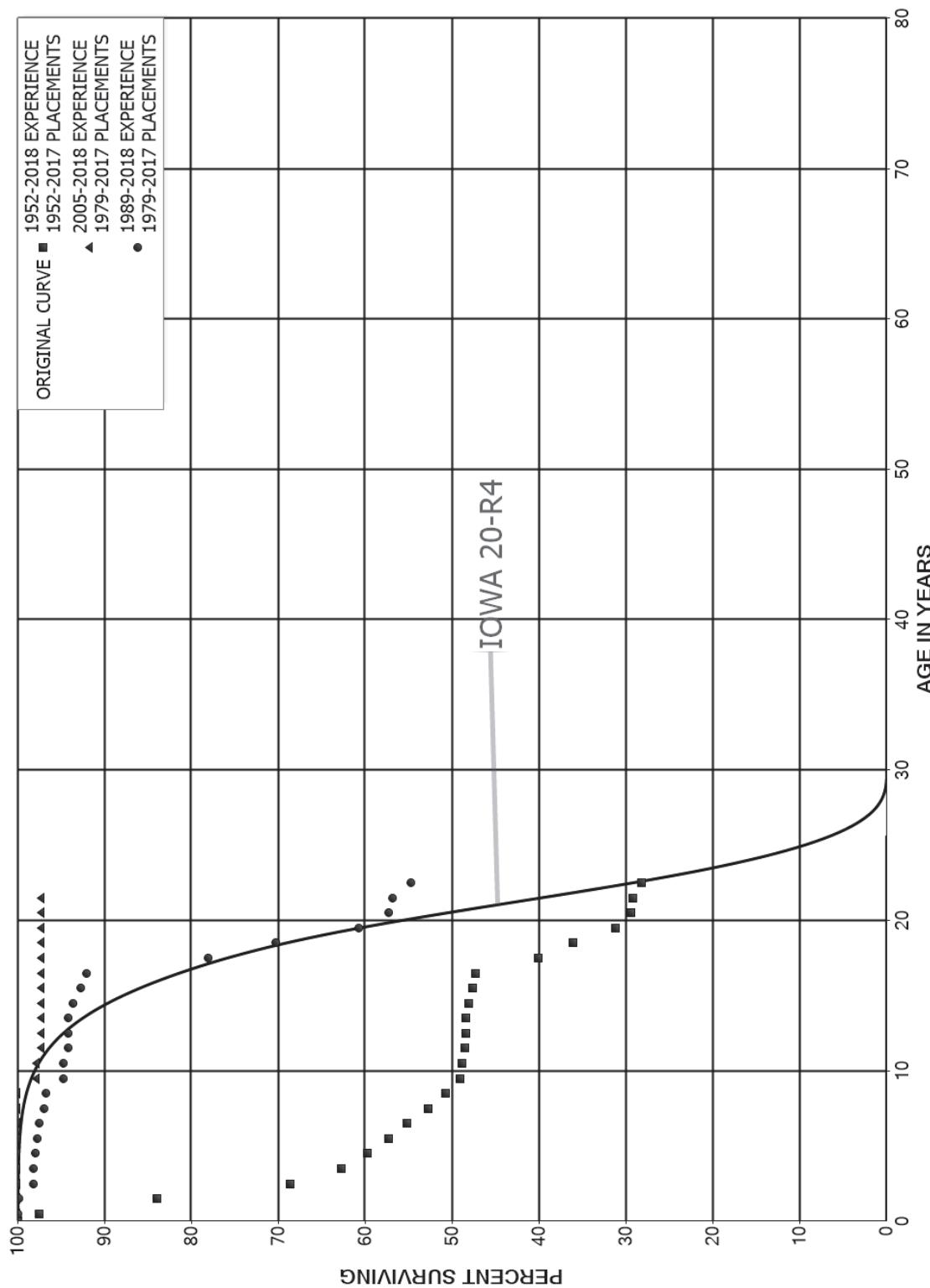
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1928-2016

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
79.5	49		0.0000		
80.5	49		0.0000		
81.5	49	0	0.0022		
82.5	49	49	1.0000		
83.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 387.00 OTHER EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 387.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1952-2017			EXPERIENCE BAND 1952-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	113,783	2,894	0.0254	0.9746	100.00
0.5	110,889	15,323	0.1382	0.8618	97.46
1.5	77,289	14,104	0.1825	0.8175	83.99
2.5	63,185	5,499	0.0870	0.9130	68.66
3.5	57,686	2,710	0.0470	0.9530	62.69
4.5	54,977	2,223	0.0404	0.9596	59.74
5.5	51,768	1,971	0.0381	0.9619	57.33
6.5	49,894	2,201	0.0441	0.9559	55.14
7.5	54,779	2,115	0.0386	0.9614	52.71
8.5	145,001	4,669	0.0322	0.9678	50.68
9.5	265,193	1,263	0.0048	0.9952	49.04
10.5	636,841	4,268	0.0067	0.9933	48.81
11.5	632,573	723	0.0011	0.9989	48.48
12.5	631,850	943	0.0015	0.9985	48.43
13.5	623,820	3,648	0.0058	0.9942	48.36
14.5	527,835	4,782	0.0091	0.9909	48.07
15.5	398,191	2,939	0.0074	0.9926	47.64
16.5	22,341	3,395	0.1520	0.8480	47.29
17.5	18,946	1,894	0.1000	0.9000	40.10
18.5	17,052	2,328	0.1365	0.8635	36.09
19.5	14,723	819	0.0556	0.9444	31.16
20.5	13,905	118	0.0085	0.9915	29.43
21.5	493	18	0.0361	0.9639	29.18
22.5	475	0.0000	1.0000	28.13	
23.5	475	0.0000	1.0000	28.13	
24.5	475	0.0000	1.0000	28.13	
25.5	475	0.0000	1.0000	28.13	
26.5	475	0.0000	1.0000	28.13	
27.5	475	0.0000	1.0000	28.13	
28.5	475	0.0000	1.0000	28.13	
29.5	475	0.0000	1.0000	28.13	
30.5	475	0.0000	1.0000	28.13	
31.5	475	0.0000	1.0000	28.13	
32.5	475	0.0000	1.0000	28.13	
33.5					28.13

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 387.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1979-2017			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	22,407		0.0000	1.0000	100.00
0.5	22,407		0.0000	1.0000	100.00
1.5	4,130		0.0000	1.0000	100.00
2.5	4,130		0.0000	1.0000	100.00
3.5	4,130		0.0000	1.0000	100.00
4.5	4,130		0.0000	1.0000	100.00
5.5	3,145		0.0000	1.0000	100.00
6.5	3,242		0.0000	1.0000	100.00
7.5	23,622		0.0000	1.0000	100.00
8.5	118,661	2,702	0.0228	0.9772	100.00
9.5	240,821		0.0000	1.0000	97.72
10.5	613,732	3,242	0.0053	0.9947	97.72
11.5	610,490		0.0000	1.0000	97.21
12.5	610,490		0.0000	1.0000	97.21
13.5	603,404		0.0000	1.0000	97.21
14.5	511,067		0.0000	1.0000	97.21
15.5	386,205		0.0000	1.0000	97.21
16.5	13,294		0.0000	1.0000	97.21
17.5	13,294		0.0000	1.0000	97.21
18.5	13,294		0.0000	1.0000	97.21
19.5	13,294		0.0000	1.0000	97.21
20.5	13,294		0.0000	1.0000	97.21
21.5					97.21
22.5					
23.5					
24.5					
25.5	475		0.0000		
26.5	475		0.0000		
27.5	475		0.0000		
28.5	475		0.0000		
29.5	475		0.0000		
30.5	475		0.0000		
31.5	475		0.0000		
32.5	475		0.0000		
33.5					

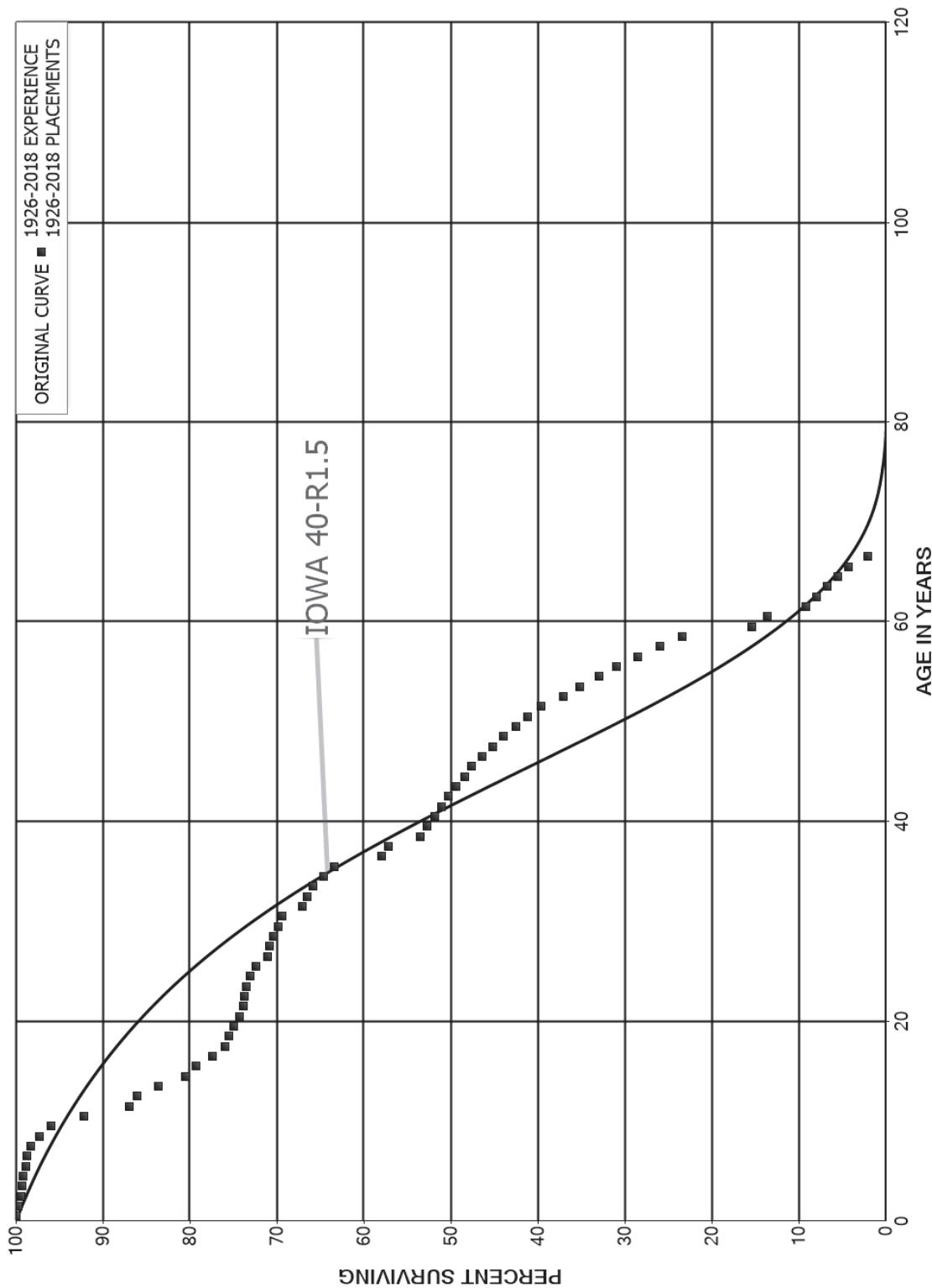
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 387.00 OTHER EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1979-2017			EXPERIENCE BAND 1989-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	45,230		0.0000	1.0000	100.00
0.5	49,787	65	0.0013	0.9987	100.00
1.5	33,479	572	0.0171	0.9829	99.87
2.5	37,088	15	0.0004	0.9996	98.16
3.5	37,964	58	0.0015	0.9985	98.13
4.5	40,997	111	0.0027	0.9973	97.98
5.5	40,033	89	0.0022	0.9978	97.71
6.5	40,163	231	0.0058	0.9942	97.49
7.5	47,018	80	0.0017	0.9983	96.93
8.5	139,275	2,949	0.0212	0.9788	96.77
9.5	261,663	13	0.0001	0.9999	94.72
10.5	634,561	3,384	0.0053	0.9947	94.71
11.5	631,177	87	0.0001	0.9999	94.21
12.5	631,090	482	0.0008	0.9992	94.20
13.5	623,522	3,386	0.0054	0.9946	94.12
14.5	527,799	4,747	0.0090	0.9910	93.61
15.5	398,191	2,939	0.0074	0.9926	92.77
16.5	22,341	3,395	0.1520	0.8480	92.09
17.5	18,946	1,894	0.1000	0.9000	78.09
18.5	17,052	2,328	0.1365	0.8635	70.28
19.5	14,723	819	0.0556	0.9444	60.69
20.5	13,905	118	0.0085	0.9915	57.31
21.5	493	18	0.0361	0.9639	56.83
22.5	475		0.0000	1.0000	54.78
23.5	475		0.0000	1.0000	54.78
24.5	475		0.0000	1.0000	54.78
25.5	475		0.0000	1.0000	54.78
26.5	475		0.0000	1.0000	54.78
27.5	475		0.0000	1.0000	54.78
28.5	475		0.0000	1.0000	54.78
29.5	475		0.0000	1.0000	54.78
30.5	475		0.0000	1.0000	54.78
31.5	475		0.0000	1.0000	54.78
32.5	475		0.0000	1.0000	54.78
33.5					54.78

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 390.00 STRUCTURES AND IMPROVEMENTS
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 390.00 STRUCTURES AND IMPROVEMENTS

ORIGINAL LIFE TABLE

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	5,818,661	3,728	0.0006	0.9994	100.00
0.5	5,792,968	13,973	0.0024	0.9976	99.94
1.5	5,772,817	17,976	0.0031	0.9969	99.69
2.5	5,696,367	6,033	0.0011	0.9989	99.38
3.5	5,447,060	6,087	0.0011	0.9989	99.28
4.5	5,372,277	19,140	0.0036	0.9964	99.17
5.5	5,346,905	7,213	0.0013	0.9987	98.81
6.5	5,322,462	21,387	0.0040	0.9960	98.68
7.5	4,837,092	48,332	0.0100	0.9900	98.29
8.5	3,910,018	56,604	0.0145	0.9855	97.30
9.5	3,516,251	136,967	0.0390	0.9610	95.89
10.5	3,315,906	185,313	0.0559	0.9441	92.16
11.5	3,046,619	33,792	0.0111	0.9889	87.01
12.5	2,775,451	79,055	0.0285	0.9715	86.04
13.5	2,583,924	95,961	0.0371	0.9629	83.59
14.5	2,463,093	36,650	0.0149	0.9851	80.49
15.5	2,357,361	57,871	0.0245	0.9755	79.29
16.5	1,852,842	33,450	0.0181	0.9819	77.34
17.5	1,792,430	11,465	0.0064	0.9936	75.95
18.5	1,713,164	11,088	0.0065	0.9935	75.46
19.5	1,656,799	15,870	0.0096	0.9904	74.97
20.5	1,602,680	8,329	0.0052	0.9948	74.26
21.5	1,567,674	2,780	0.0018	0.9982	73.87
22.5	1,512,499	4,549	0.0030	0.9970	73.74
23.5	1,453,591	9,773	0.0067	0.9933	73.52
24.5	1,414,261	12,963	0.0092	0.9908	73.02
25.5	1,393,204	25,114	0.0180	0.9820	72.35
26.5	1,331,797	4,721	0.0035	0.9965	71.05
27.5	1,310,039	7,998	0.0061	0.9939	70.80
28.5	902,641	6,932	0.0077	0.9923	70.36
29.5	885,325	5,491	0.0062	0.9938	69.82
30.5	857,552	28,205	0.0329	0.9671	69.39
31.5	809,126	6,992	0.0086	0.9914	67.11
32.5	789,839	8,210	0.0104	0.9896	66.53
33.5	408,391	7,307	0.0179	0.9821	65.84
34.5	382,514	7,519	0.0197	0.9803	64.66
35.5	374,608	32,018	0.0855	0.9145	63.39
36.5	341,391	4,621	0.0135	0.9865	57.97
37.5	324,422	20,864	0.0643	0.9357	57.19
38.5	299,174	4,608	0.0154	0.9846	53.51

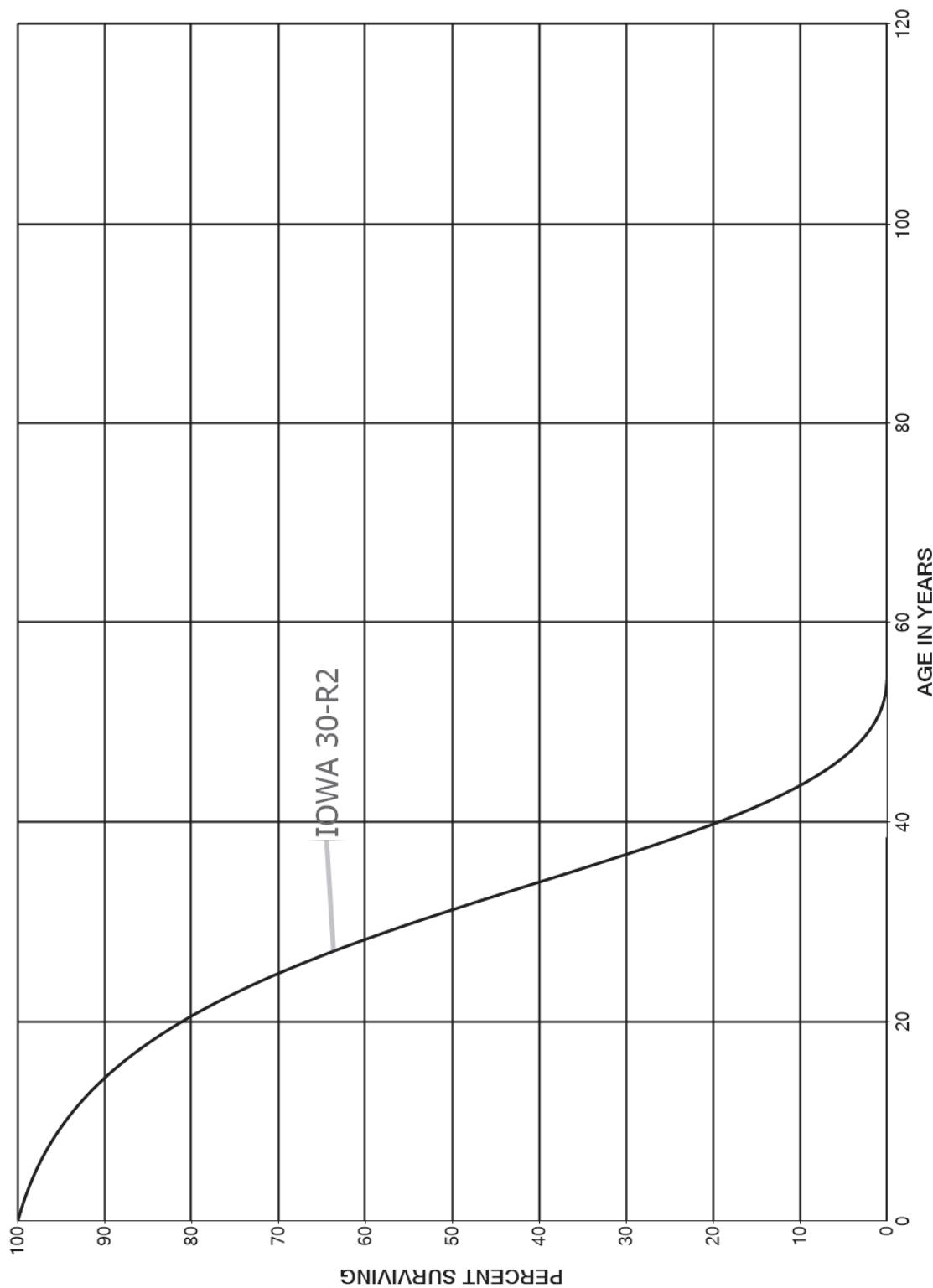
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 390.00 STRUCTURES AND IMPROVEMENTS

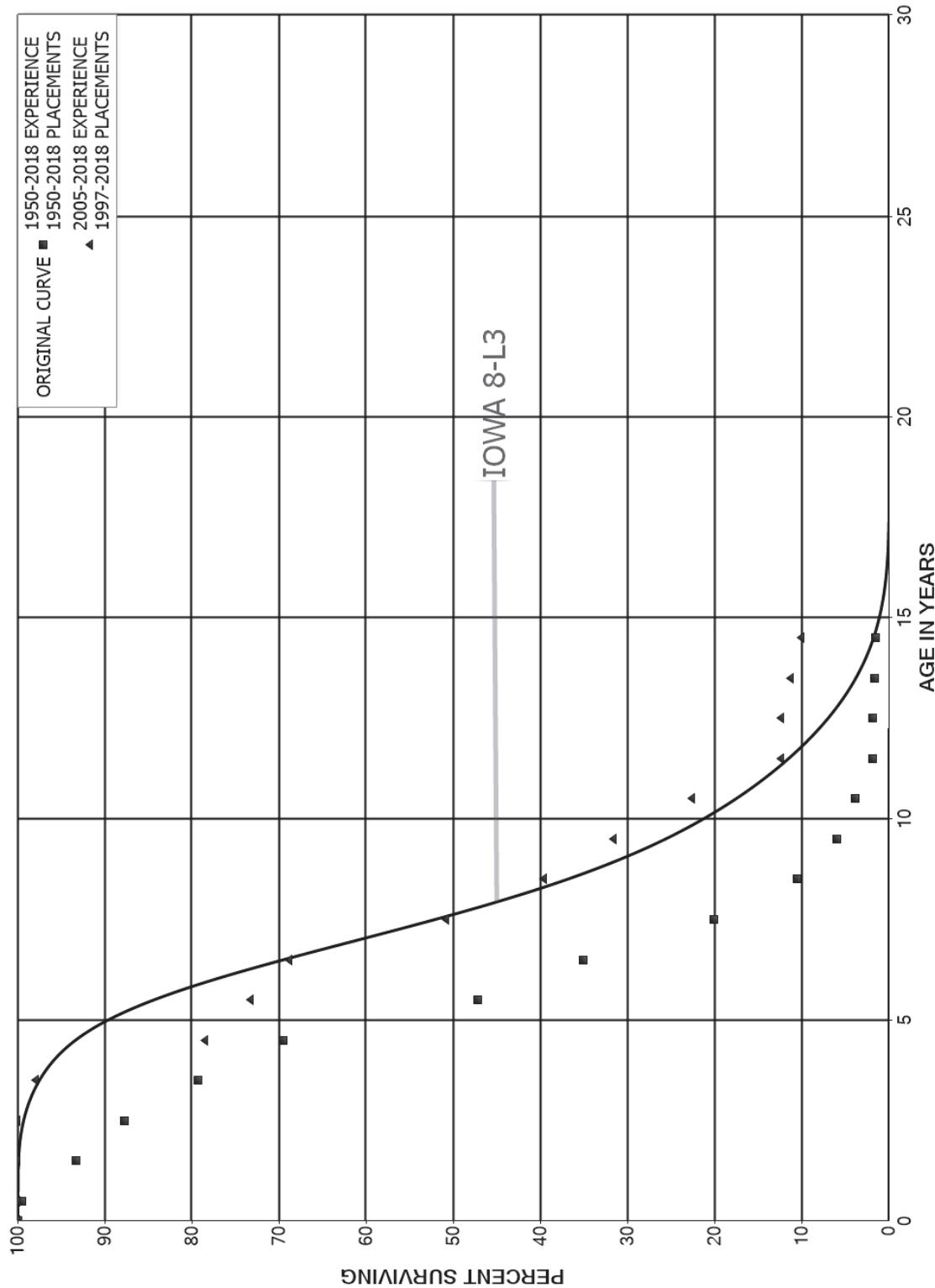
ORIGINAL LIFE TABLE, CONT.

PLACEMENT BAND 1926-2018			EXPERIENCE BAND 1926-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
39.5	290,883	4,456	0.0153	0.9847	52.68
40.5	253,273	4,228	0.0167	0.9833	51.88
41.5	222,640	3,261	0.0146	0.9854	51.01
42.5	204,265	3,740	0.0183	0.9817	50.26
43.5	190,127	3,594	0.0189	0.9811	49.34
44.5	183,676	3,184	0.0173	0.9827	48.41
45.5	175,246	4,199	0.0240	0.9760	47.57
46.5	168,950	4,656	0.0276	0.9724	46.43
47.5	163,728	4,527	0.0277	0.9723	45.15
48.5	155,004	4,767	0.0308	0.9692	43.90
49.5	146,250	4,926	0.0337	0.9663	42.55
50.5	137,567	5,156	0.0375	0.9625	41.12
51.5	128,899	8,263	0.0641	0.9359	39.58
52.5	117,400	5,758	0.0490	0.9510	37.04
53.5	108,717	6,846	0.0630	0.9370	35.23
54.5	99,301	6,208	0.0625	0.9375	33.01
55.5	90,923	7,192	0.0791	0.9209	30.94
56.5	82,045	7,483	0.0912	0.9088	28.50
57.5	73,580	7,089	0.0963	0.9037	25.90
58.5	66,490	22,862	0.3438	0.6562	23.40
59.5	43,629	5,058	0.1159	0.8841	15.36
60.5	38,570	12,400	0.3215	0.6785	13.58
61.5	26,170	3,644	0.1392	0.8608	9.21
62.5	22,526	3,328	0.1477	0.8523	7.93
63.5	19,198	3,465	0.1805	0.8195	6.76
64.5	15,733	3,451	0.2194	0.7806	5.54
65.5	12,282	6,401	0.5212	0.4788	4.32
66.5	5,880	1,746	0.2969	0.7031	2.07
67.5	4,135	1,414	0.3421	0.6579	1.46
68.5	2,720	838	0.3082	0.6918	0.96
69.5	1,882	579	0.3077	0.6923	0.66
70.5	1,303	321	0.2465	0.7535	0.46
71.5	982	982	1.0000		0.35
72.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 390.09 LEASEHOLD IMPROVEMENTS
SMOOTH SURVIVOR CURVE



ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 392.00 TRANSPORTATION EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 392.00 TRANSPORTATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1950-2018			EXPERIENCE BAND 1950-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	6,418,844	34,564	0.0054	0.9946	100.00
0.5	6,380,782	394,303	0.0618	0.9382	99.46
1.5	5,995,977	359,887	0.0600	0.9400	93.32
2.5	5,772,102	554,021	0.0960	0.9040	87.71
3.5	5,263,345	649,861	0.1235	0.8765	79.30
4.5	4,613,484	1,480,196	0.3208	0.6792	69.50
5.5	3,133,288	804,911	0.2569	0.7431	47.20
6.5	2,363,343	1,011,561	0.4280	0.5720	35.08
7.5	1,399,120	662,957	0.4738	0.5262	20.06
8.5	550,372	242,686	0.4409	0.5591	10.56
9.5	295,777	104,689	0.3539	0.6461	5.90
10.5	190,626	98,958	0.5191	0.4809	3.81
11.5	91,668	59	0.0006	0.9994	1.83
12.5	91,609	8,499	0.0928	0.9072	1.83
13.5	65,376	6,778	0.1037	0.8963	1.66
14.5	48,241		0.0000	1.0000	1.49
15.5	48,241		0.0000	1.0000	1.49
16.5	48,241		0.0000	1.0000	1.49
17.5	48,241		0.0000	1.0000	1.49
18.5	48,241		0.0000	1.0000	1.49
19.5	48,241	48,241	1.0000		1.49
20.5					

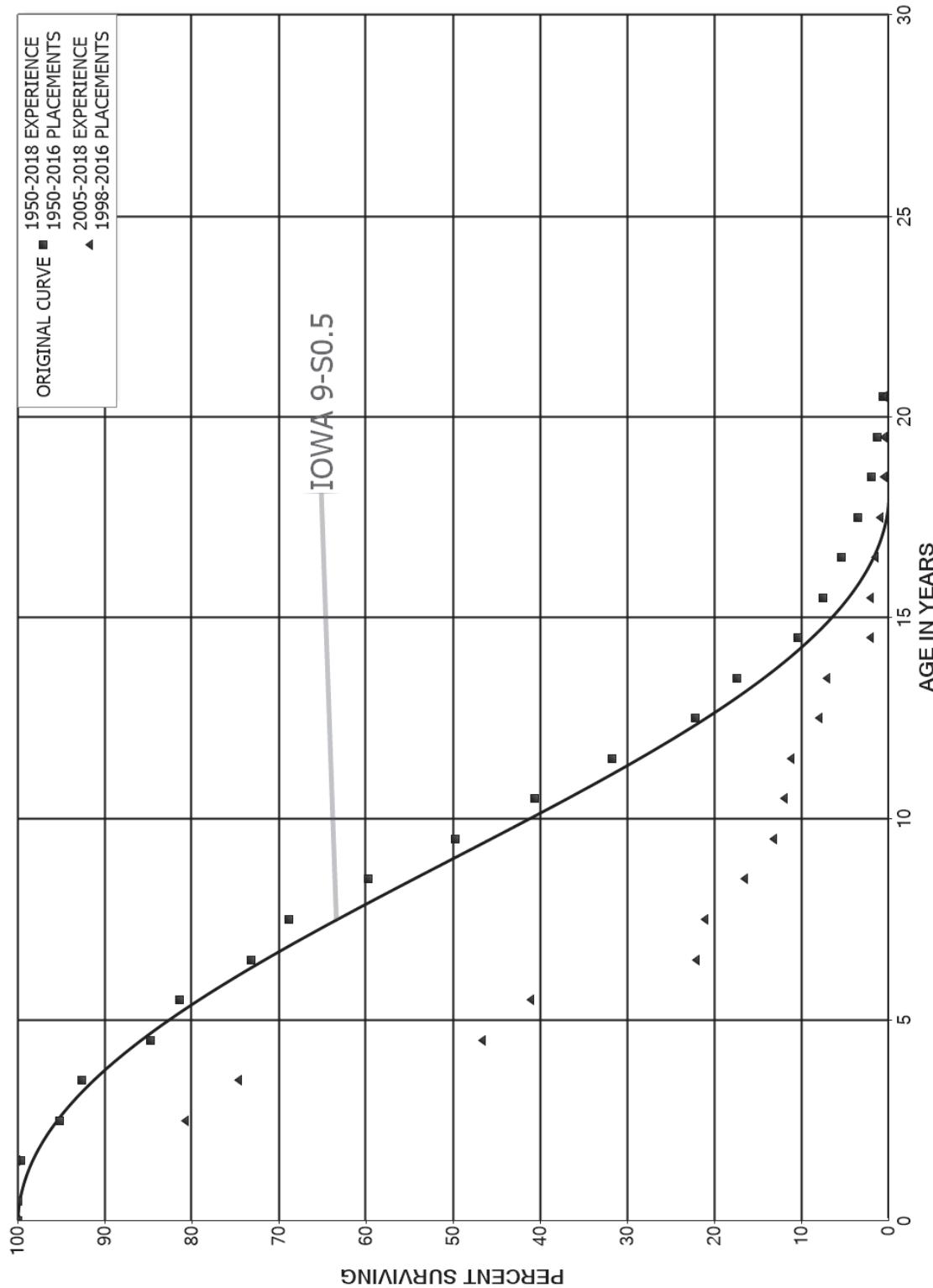
ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 392.00 TRANSPORTATION EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1997-2018			EXPERIENCE BAND 2005-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	245,487		0.0000	1.0000	100.00
0.5	257,355	71	0.0003	0.9997	100.00
1.5	286,298		0.0000	1.0000	99.97
2.5	450,124	9,498	0.0211	0.9789	99.97
3.5	516,433	102,793	0.1990	0.8010	97.86
4.5	417,533	27,947	0.0669	0.9331	78.38
5.5	430,282	26,037	0.0605	0.9395	73.14
6.5	758,472	198,435	0.2616	0.7384	68.71
7.5	637,170	141,100	0.2214	0.7786	50.74
8.5	310,280	63,076	0.2033	0.7967	39.50
9.5	235,295	66,773	0.2838	0.7162	31.47
10.5	168,060	76,450	0.4549	0.5451	22.54
11.5	91,609		0.0000	1.0000	12.29
12.5	91,609	8,499	0.0928	0.9072	12.29
13.5	65,376	6,778	0.1037	0.8963	11.15
14.5	48,241		0.0000	1.0000	9.99
15.5	48,241		0.0000	1.0000	9.99
16.5	48,241		0.0000	1.0000	9.99
17.5	48,241		0.0000	1.0000	9.99
18.5	48,241		0.0000	1.0000	9.99
19.5	48,241	48,241	1.0000		9.99
20.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION
ACCOUNT 396.00 POWER OPERATED EQUIPMENT
ORIGINAL AND SMOOTH SURVIVOR CURVES



ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 396.00 POWER OPERATED EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1950-2016			EXPERIENCE BAND 1950-2018		
AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	3,397,336	2,400	0.0007	0.9993	100.00
0.5	3,394,936	9,947	0.0029	0.9971	99.93
1.5	3,384,989	151,705	0.0448	0.9552	99.64
2.5	3,278,681	87,806	0.0268	0.9732	95.17
3.5	3,190,875	271,744	0.0852	0.9148	92.62
4.5	2,931,175	116,824	0.0399	0.9601	84.73
5.5	2,808,925	280,720	0.0999	0.9001	81.36
6.5	2,528,205	151,706	0.0600	0.9400	73.23
7.5	2,376,499	315,468	0.1327	0.8673	68.83
8.5	2,061,031	345,230	0.1675	0.8325	59.70
9.5	1,702,987	311,863	0.1831	0.8169	49.70
10.5	1,391,124	302,312	0.2173	0.7827	40.60
11.5	1,088,812	329,122	0.3023	0.6977	31.77
12.5	759,690	164,772	0.2169	0.7831	22.17
13.5	594,917	238,347	0.4006	0.5994	17.36
14.5	356,570	98,151	0.2753	0.7247	10.41
15.5	258,420	72,239	0.2795	0.7205	7.54
16.5	186,181	64,816	0.3481	0.6519	5.43
17.5	121,365	55,621	0.4583	0.5417	3.54
18.5	60,974	20,829	0.3416	0.6584	1.92
19.5	40,145	20,986	0.5228	0.4772	1.26
20.5	13,381	6,866	0.5131	0.4869	0.60
21.5	6,515	3,985	0.6116	0.3884	0.29
22.5	2,530	1,863	0.7365	0.2635	0.11
23.5	667	630	0.9447	0.0553	0.03
24.5	37	37	1.0000		0.00
25.5					

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 396.00 POWER OPERATED EQUIPMENT

ORIGINAL LIFE TABLE

PLACEMENT BAND 1998-2016

EXPERIENCE BAND 2005-2018

AGE AT BEGIN OF INTERVAL	EXPOSURES AT BEGINNING OF AGE INTERVAL	RETIREMENTS DURING AGE INTERVAL	RETMT RATIO	SURV RATIO	PCT SURV BEGIN OF INTERVAL
0.0	588,748		0.0000	1.0000	100.00
0.5	656,962		0.0000	1.0000	100.00
1.5	672,162	129,991	0.1934	0.8066	100.00
2.5	587,568	44,798	0.0762	0.9238	80.66
3.5	576,880	217,056	0.3763	0.6237	74.51
4.5	460,955	54,320	0.1178	0.8822	46.48
5.5	422,255	195,755	0.4636	0.5364	41.00
6.5	610,133	28,517	0.0467	0.9533	21.99
7.5	581,617	127,609	0.2194	0.7806	20.96
8.5	454,007	90,225	0.1987	0.8013	16.36
9.5	350,969	33,393	0.0951	0.9049	13.11
10.5	317,576	19,992	0.0630	0.9370	11.86
11.5	297,584	89,192	0.2997	0.7003	11.12
12.5	208,392	21,357	0.1025	0.8975	7.79
13.5	187,036	134,954	0.7215	0.2785	6.99
14.5	52,082		0.0000	1.0000	1.95
15.5	52,082	14,773	0.2837	0.7163	1.95
16.5	37,309	14,947	0.4006	0.5994	1.39
17.5	22,362	11,814	0.5283	0.4717	0.84
18.5	5,778		0.0000	1.0000	0.39
19.5	5,778		0.0000	1.0000	0.39
20.5					0.39

PART VIII. NET SALVAGE STATISTICS

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 350.20 THROUGH 357.00 STORAGE

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1995	5,962		0		0		0
1996							
1997							
1998							
1999							
2000	30,617		0		0		0
2001	416		0		0		0
2002							
2003							
2004							
2005							
2006							
2007	180,995	12,263	7	100,204	55	87,941	49
2008							
2009	14,118		0		0		0
2010							
2011							
2012	7,556	2,105	28		0	2,105-	28-
2013	155,807	1,078	1		0	1,078-	1-
2014		181				181-	
2015		5,025-				5,025	
2016							
2017							
2018	60,551	793,133			0	793,133-	
TOTAL	456,022	803,734	176	100,204	22	703,530-	154-

THREE-YEAR MOVING AVERAGES

95-97	1,987		0		0		0
96-98							
97-99							
98-00	10,206		0		0		0
99-01	10,344		0		0		0
00-02	10,344		0		0		0
01-03	139		0		0		0
02-04							
03-05							
04-06							
05-07	60,332	4,088	7	33,401	55	29,314	49
06-08	60,332	4,088	7	33,401	55	29,314	49
07-09	65,038	4,088	6	33,401	51	29,314	45

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 350.20 THROUGH 357.00 STORAGE

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
08-10	4,706		0		0		0
09-11	4,706		0		0		0
10-12	2,519	702	28		0	702-	28-
11-13	54,454	1,061	2		0	1,061-	2-
12-14	54,454	1,121	2		0	1,121-	2-
13-15	51,936	1,256-	2-		0	1,256	2
14-16		1,615-				1,615	
15-17		1,675-				1,675	
16-18	20,184	264,378			0	264,378-	
FIVE-YEAR AVERAGE							
14-18	12,110	157,658			0	157,658-	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE		
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT	
1992	18,617		0		0		0	
1993								
1994	2,126		0		0		0	
1995	7,353		0		0		0	
1996	263		0		0		0	
1997	107		0		0		0	
1998	3,873		0		0		0	
1999								
2000								
2001								
2002	11,267	7,936	70		0	7,936-	70-	
2003	47,856	4,341	9		0	4,341-	9-	
2004	84,165		0		0		0	
2005	22,121	7,758	35		0	7,758-	35-	
2006								
2007								
2008		79,972				79,972-		
2009	47,443		441	1		441-	1-	
2010								
2011								
2012								
2013	272,308	270,003	99		4,050	1	265,953-	98-
2014	106,148	359,197	338		0		359,197-	338-
2015								
2016								
2017								
2018								
TOTAL	623,647	729,649	117		4,050	1	725,599-	116-

THREE-YEAR MOVING AVERAGES

92-94	6,914		0		0		0
93-95	3,160		0		0		0
94-96	3,247		0		0		0
95-97	2,574		0		0		0
96-98	1,414		0		0		0
97-99	1,327		0		0		0
98-00	1,291		0		0		0
99-01							
00-02	3,756	2,645	70		0	2,645-	70-
01-03	19,708	4,092	21		0	4,092-	21-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 367.00 AND 367.01 MAINS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	47,763	4,092	9	0		4,092-	9-
03-05	51,381	4,033	8	0		4,033-	8-
04-06	35,429	2,586	7	0		2,586-	7-
05-07	7,374	2,586	35	0		2,586-	35-
06-08		26,657				26,657-	
07-09	15,814	26,804	169	0		26,804-	169-
08-10	15,814	26,804	169	0		26,804-	169-
09-11	15,814	147	1	0		147-	1-
10-12							
11-13	90,769	90,001	99	1,350	1	88,651-	98-
12-14	126,152	209,733	166	1,350	1	208,383-	165-
13-15	126,152	209,733	166	1,350	1	208,383-	165-
14-16	35,383	119,732	338	0		119,732-	338-
15-17							
16-18							
FIVE-YEAR AVERAGE							
14-18	21,230	71,839	338	0		71,839-	338-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1993	2,450		0		0		0
1994							
1995							
1996							
1997							
1998							
1999							
2000							
2001							
2002							
2003	14,988	15,959	106		0	15,959-	106-
2004	45,683		0		0		0
2005	30,242	10,074	33	4,942	16	5,131-	17-
2006							
2007							
2008							
2009							
2010							
2011							
2012							
2013		278				278-	
2014							
2015							
2016	1,324		0		0		0
2017							
2018							
TOTAL	94,687	26,311	28	4,942	5	21,368-	23-

THREE-YEAR MOVING AVERAGES

93-95	817		0		0		0
94-96							
95-97							
96-98							
97-99							
98-00							
99-01							
00-02							
01-03	4,996	5,320	106		0	5,320-	106-
02-04	20,224	5,320	26		0	5,320-	26-
03-05	30,305	8,678	29	1,647	5	7,030-	23-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
04-06	25,309	3,358	13	1,647	7	1,710-	7-
05-07	10,081	3,358	33	1,647	16	1,710-	17-
06-08							
07-09							
08-10							
09-11							
10-12							
11-13		93				93-	
12-14		93				93-	
13-15		93				93-	
14-16	441		0		0		0
15-17	441		0		0		0
16-18	441		0		0		0
FIVE-YEAR AVERAGE							
14-18	265		0		0		0

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	5,268		0		0		0
1993	5,334		0		0		0
1994	137		0		0		0
1995							
1996							
1997							
1998	191		0		0		0
1999							
2000	1,720		0		0		0
2001							
2002							
2003	14,889	586	4		0	586-	4-
2004	1,070		0		0		0
2005	19,266	264	1	134	1	130-	1-
2006							
2007	75	862			0	862-	
2008							
2009							
2010							
2011							
2012							
2013							
2014							
2015			9			9-	
2016							
2017							
2018							
TOTAL	47,950	1,721	4	134	0	1,587-	3-

THREE-YEAR MOVING AVERAGES

92-94	3,580	0		0		0
93-95	1,824	0		0		0
94-96	46	0		0		0
95-97						
96-98	64	0		0		0
97-99	64	0		0		0
98-00	637	0		0		0
99-01	573	0		0		0
00-02	573	0		0		0
01-03	4,963	195	4	0		195-
						4-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	5,320	195	4	0		195-	4-
03-05	11,742	283	2	45	0	239-	2-
04-06	6,779	88	1	45	1	43-	1-
05-07	6,447	375	6	45	1	331-	5-
06-08	25	287		0		287-	
07-09	25	287		0		287-	
08-10							
09-11							
10-12							
11-13							
12-14							
13-15		3				3-	
14-16		3				3-	
15-17		3				3-	
16-18							
FIVE-YEAR AVERAGE							
14-18		2				2-	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	171,280	48,550	28		0	48,550-	28-
1993	86,295	58,282	68		0	58,282-	68-
1994	104,730	28,436	27		0	28,436-	27-
1995	120,193	29,842	25		0	29,842-	25-
1996	163,417	28,348	17		0	28,348-	17-
1997	116,108	26,858	23		0	26,858-	23-
1998	40,600	14,772	36	830	2	13,942-	34-
1999	37,780	30,475	81	5,917	16	24,558-	65-
2000	136,663	1,962	1		0	1,962-	1-
2001	132,238	698,855	528		0	698,855-	528-
2002	854,804	14,591	2		0	14,591-	2-
2003	699,314	50,115	7		0	50,115-	7-
2004	3,169,518	112,392	4		0	112,392-	4-
2005	749,382	294,555	39	17,912	2	276,643-	37-
2006	210,249	244,589	116		0	244,589-	116-
2007	525,828	279,508	53		0	279,508-	53-
2008	327,137	441,592	135		0	441,592-	135-
2009	602,677	223,225	37		0	223,225-	37-
2010	502,639	442,771	88		0	442,771-	88-
2011	818,444	391,173	48		0	391,173-	48-
2012	2,018,190	1,837,714	91	8,637	0	1,829,077-	91-
2013	1,345,445	965,510	72		0	965,510-	72-
2014	1,372,668	706,931	52		0	706,931-	52-
2015	1,207,408	1,717,341	142	470	0	1,716,871-	142-
2016	721,244	574,495	80	531-	0	575,026-	80-
2017	1,040,195	731,385	70		0	731,385-	70-
2018	399,291	275,090	69		0	275,090-	69-
TOTAL	17,673,737	10,269,357	58	33,234	0	10,236,122-	58-

THREE-YEAR MOVING AVERAGES

92-94	120,768	45,089	37		0	45,089-	37-
93-95	103,739	38,853	37		0	38,853-	37-
94-96	129,447	28,875	22		0	28,875-	22-
95-97	133,239	28,349	21		0	28,349-	21-
96-98	106,708	23,326	22	277	0	23,049-	22-
97-99	64,829	24,035	37	2,249	3	21,786-	34-
98-00	71,681	15,736	22	2,249	3	13,487-	19-
99-01	102,227	243,764	238	1,972	2	241,792-	237-
00-02	374,568	238,469	64		0	238,469-	64-
01-03	562,119	254,520	45		0	254,520-	45-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 376.00 THROUGH 376.02 MAINS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	1,574,545	59,033	4		0	59,033-	4-
03-05	1,539,405	152,354	10	5,971	0	146,383-	10-
04-06	1,376,383	217,179	16	5,971	0	211,208-	15-
05-07	495,153	272,884	55	5,971	1	266,913-	54-
06-08	354,405	321,896	91		0	321,896-	91-
07-09	485,214	314,775	65		0	314,775-	65-
08-10	477,484	369,196	77		0	369,196-	77-
09-11	641,253	352,390	55		0	352,390-	55-
10-12	1,113,091	890,553	80	2,879	0	887,674-	80-
11-13	1,394,026	1,064,799	76	2,879	0	1,061,920-	76-
12-14	1,578,768	1,170,052	74	2,879	0	1,167,172-	74-
13-15	1,308,507	1,129,927	86	157	0	1,129,771-	86-
14-16	1,100,440	999,589	91	20-	0	999,609-	91-
15-17	989,616	1,007,740	102	20-	0	1,007,761-	102-
16-18	720,243	526,990	73	177-	0	527,167-	73-
FIVE-YEAR AVERAGE							
14-18	948,161	801,048	84		12-	0	801,061- 84-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	40,730		0		0		0
1993	20,897		0		0		0
1994	20,935		0		0		0
1995	3,259		0		0		0
1996	20,759		0		0		0
1997	11,964		0		0		0
1998	2,299		0		0		0
1999							
2000	3,137		0		0		0
2001	8,486		0		0		0
2002	75,966		0		0		0
2003	56,121	3,845	7		0	3,845-	7-
2004	480,187	238,533	50		0	238,533-	50-
2005	413,841	51,069	12	7,954	2	43,115-	10-
2006							
2007		87				87-	
2008	235	884	376		0	884-	376-
2009							
2010	2,375	5,548	234		0	5,548-	234-
2011	25,853		0		0		0
2012	6,980	1,213	17		0	1,213-	17-
2013	5,476	922	17		0	922-	17-
2014	8,235	2,655	32		0	2,655-	32-
2015		772				772-	
2016							
2017	2,124	8,093	381		0	8,093-	381-
2018		113				113-	
TOTAL	1,209,859	313,736	26	7,954	1	305,782-	25-

THREE-YEAR MOVING AVERAGES

92-94	27,521	0		0		0
93-95	15,030	0		0		0
94-96	14,984	0		0		0
95-97	11,994	0		0		0
96-98	11,674	0		0		0
97-99	4,754	0		0		0
98-00	1,812	0		0		0
99-01	3,874	0		0		0
00-02	29,196	0		0		0
01-03	46,858	1,282	3	0		1,282-
						3-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	204,091	80,793	40		0	80,793-	40-
03-05	316,716	97,816	31	2,651	1	95,164-	30-
04-06	298,009	96,534	32	2,651	1	93,883-	32-
05-07	137,947	17,052	12	2,651	2	14,401-	10-
06-08	78	324	413		0	324-	413-
07-09	78	324	413		0	324-	413-
08-10	870	2,144	246		0	2,144-	246-
09-11	9,409	1,849	20		0	1,849-	20-
10-12	11,736	2,254	19		0	2,254-	19-
11-13	12,770	712	6		0	712-	6-
12-14	6,897	1,597	23		0	1,597-	23-
13-15	4,570	1,450	32		0	1,450-	32-
14-16	2,745	1,143	42		0	1,143-	42-
15-17	708	2,955	417		0	2,955-	417-
16-18	708	2,735	386		0	2,735-	386-
FIVE-YEAR AVERAGE							
14-18	2,072	2,327	112		0	2,327-	112-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	55,370		0		0		0
1993	5,751		0		0		0
1994	17,200		0		0		0
1995	5,725		0		0		0
1996	3,751		0		0		0
1997	1,773		0		0		0
1998							
1999	1,076		0		0		0
2000							
2001							
2002							
2003	1,085		0		0		0
2004	1,611	210	13		0	210-	13-
2005	69,520	32	0		0	32-	0
2006							
2007	3,372	878	26		0	878-	26-
2008	1,169	214	18		0	214-	18-
2009	214		0		0		0
2010							
2011							
2012							
2013							
2014							
2015		932				932-	
2016	274	1,878	687		0	1,878-	687-
2017							
2018	1,175	941	80		0	941-	80-
TOTAL	169,065	5,086	3		0	5,086-	3-

THREE-YEAR MOVING AVERAGES

92-94	26,107	0	0	0
93-95	9,559	0	0	0
94-96	8,892	0	0	0
95-97	3,750	0	0	0
96-98	1,841	0	0	0
97-99	950	0	0	0
98-00	359	0	0	0
99-01	359	0	0	0
00-02				
01-03	362	0	0	0

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	899	70	8	0		70-	8-
03-05	24,072	81	0	0		81-	0
04-06	23,710	81	0	0		81-	0
05-07	24,297	303	1	0		303-	1-
06-08	1,514	364	24	0		364-	24-
07-09	1,585	364	23	0		364-	23-
08-10	461	71	15	0		71-	15-
09-11	71		0	0			0
10-12							
11-13							
12-14							
13-15		311				311-	
14-16	91	937		0		937-	
15-17	91	937		0		937-	
16-18	483	940	195	0		940-	195-
FIVE-YEAR AVERAGE							
14-18	290	750	259	0		750-	259-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	66,030	18,874	29		0	18,874-	29-
1993	4,222	2,851	68		0	2,851-	68-
1994	25,694	6,976	27		0	6,976-	27-
1995	35,856	8,903	25		0	8,903-	25-
1996	58,997	10,234	17		0	10,234-	17-
1997	73,533	17,010	23		0	17,010-	23-
1998	67,061	45,067	67	964	1	44,103-	66-
1999		30,149		18,919		11,230-	
2000	167,766	3	0		0	3-	0
2001	141,681	110,353	78		0	110,353-	78-
2002	385,690	81,313	21		0	81,313-	21-
2003	120,376	76,017	63		0	76,017-	63-
2004	117,956	186,263	158		0	186,263-	158-
2005	418,168	179,278	43		0	179,278-	43-
2006	379,923	167,665	44		0	167,665-	44-
2007	577,566	314,841	55		0	314,841-	55-
2008	456,757	718,088	157		0	718,088-	157-
2009	500,056	354,414	71		0	354,414-	71-
2010	167,975	190,902	114		0	190,902-	114-
2011	937,637	561,214	60		0	561,214-	60-
2012	675,183	772,704	114		0	772,704-	114-
2013	592,532	501,760	85		0	501,760-	85-
2014	568,176	503,226	89		0	503,226-	89-
2015	560,432	1,272,332	227	182	0	1,272,150-	227-
2016	1,087,845	520,799	48		0	520,799-	48-
2017	486,039	256,821	53		0	256,821-	53-
2018	822,194	146,309	18		0	146,309-	18-
TOTAL	9,495,345	7,054,364	74	20,065	0	7,034,300-	74-

THREE-YEAR MOVING AVERAGES

92-94	31,982	9,567	30		0	9,567-	30-
93-95	21,924	6,243	28		0	6,243-	28-
94-96	40,182	8,704	22		0	8,704-	22-
95-97	56,129	12,049	21		0	12,049-	21-
96-98	66,530	24,104	36	321	0	23,782-	36-
97-99	46,865	30,742	66	6,628	14	24,114-	51-
98-00	78,276	25,073	32	6,628	8	18,445-	24-
99-01	103,149	46,835	45	6,306	6	40,529-	39-
00-02	231,712	63,890	28		0	63,890-	28-
01-03	215,916	89,228	41		0	89,228-	41-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	208,007	114,531	55	0	114,531-	55-	
03-05	218,833	147,186	67	0	147,186-	67-	
04-06	305,349	177,735	58	0	177,735-	58-	
05-07	458,553	220,594	48	0	220,594-	48-	
06-08	471,415	400,198	85	0	400,198-	85-	
07-09	511,459	462,447	90	0	462,447-	90-	
08-10	374,929	421,134	112	0	421,134-	112-	
09-11	535,223	368,843	69	0	368,843-	69-	
10-12	593,598	508,273	86	0	508,273-	86-	
11-13	735,117	611,893	83	0	611,893-	83-	
12-14	611,964	592,563	97	0	592,563-	97-	
13-15	573,713	759,106	132	61	759,045-	132-	
14-16	738,818	765,452	104	61	765,392-	104-	
15-17	711,439	683,317	96	61	683,257-	96-	
16-18	798,693	307,976	39	0	307,976-	39-	
FIVE-YEAR AVERAGE							
14-18	704,937	539,897	77	36	0	539,861-	77-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	203,647		0		0		0
1993	205,065		0		0		0
1994	145,665		0		0		0
1995	128,322		0		0		0
1996	160,599		0		0		0
1997	111,912		0		0		0
1998	42,691		0		0		0
1999							
2000	663		0		0		0
2001							
2002	704		0		0		0
2003							
2004							
2005	643,987		0		0		0
2006							
2007							
2008							
2009							
2010	272	274	101		0	274-	101-
2011							
2012							
2013	30,896		0		0		0
2014	158,541		0		0		0
2015	148,551		0		0		0
2016	132,595		0		0		0
2017	203,389		0		0		0
2018	386,684		0	4,545	1	4,545	1
TOTAL	2,704,182	274	0	4,545	0	4,271	0

THREE-YEAR MOVING AVERAGES

92-94	184,792	0	0	0
93-95	159,684	0	0	0
94-96	144,862	0	0	0
95-97	133,611	0	0	0
96-98	105,067	0	0	0
97-99	51,534	0	0	0
98-00	14,451	0	0	0
99-01	221	0	0	0
00-02	456	0	0	0
01-03	235	0	0	0

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	235	0		0		0	
03-05	214,662	0		0		0	
04-06	214,662	0		0		0	
05-07	214,662	0		0		0	
06-08							
07-09							
08-10	91	91 101		0		91- 101-	
09-11	91	91 101		0		91- 101-	
10-12	91	91 101		0		91- 101-	
11-13	10,299	0		0		0	
12-14	63,145	0		0		0	
13-15	112,663	0		0		0	
14-16	146,562	0		0		0	
15-17	161,512	0		0		0	
16-18	240,889	0		1,515	1	1,515	1
FIVE-YEAR AVERAGE							
14-18	205,952	0		909	0	909	0

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	32,282		0		0		0
1993	132,420		0		0		0
1994	95,552		0		0		0
1995	211,589		0		0		0
1996	138,621		0		0		0
1997	90,474		0		0		0
1998	24,740	15	0		0	15-	0
1999	3,519		0		0		0
2000	307,960		0		0		0
2001	108,580	179,251	165		0	179,251-	165-
2002	1,241,357	192,152	15		0	192,152-	15-
2003	810,480	244,412	30		0	244,412-	30-
2004	483,177	198,892	41	465	0	198,427-	41-
2005	1,047,431	150,727	14		0	150,727-	14-
2006	774,163	271,345	35		0	271,345-	35-
2007	890,414	198,811	22		0	198,811-	22-
2008	959,860	481,767	50		0	481,767-	50-
2009	681,319	210,441	31	319	0	210,122-	31-
2010	152,574	230,449	151		0	230,449-	151-
2011	1,155,294	5,088	0		0	5,088-	0
2012	531,461	623,538	117		0	623,538-	117-
2013	1,482,487	449,511	30		0	449,511-	30-
2014	1,391,192	269,540	19		0	269,540-	19-
2015	2,361,397	1,019,289	43	195	0	1,019,094-	43-
2016	1,626,498	459,623	28		0	459,623-	28-
2017	1,725,298	94,455	5		0	94,455-	5-
2018	2,878,186	99,253	3	4,112	0	95,141-	3-
TOTAL	21,338,326	5,378,559	25	5,090	0	5,373,469-	25-

THREE-YEAR MOVING AVERAGES

92-94	86,751		0		0		0
93-95	146,520		0		0		0
94-96	148,587		0		0		0
95-97	146,895		0		0		0
96-98	84,612	5	0		0	5-	0
97-99	39,578	5	0		0	5-	0
98-00	112,073	5	0		0	5-	0
99-01	140,020	59,750	43		0	59,750-	43-
00-02	552,632	123,801	22		0	123,801-	22-
01-03	720,139	205,272	29		0	205,272-	29-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 382.00 THROUGH 384.00 METER INSTALLATIONS AND HOUSE REGULATORS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	845,005	211,819	25	155	0	211,664-	25-
03-05	780,362	198,010	25	155	0	197,855-	25-
04-06	768,257	206,988	27	155	0	206,833-	27-
05-07	904,003	206,961	23	0	0	206,961-	23-
06-08	874,812	317,308	36	0	0	317,308-	36-
07-09	843,864	297,006	35	106	0	296,900-	35-
08-10	597,918	307,552	51	106	0	307,446-	51-
09-11	663,063	148,659	22	106	0	148,553-	22-
10-12	613,110	286,358	47	0	0	286,358-	47-
11-13	1,056,414	359,379	34	0	0	359,379-	34-
12-14	1,135,047	447,530	39	0	0	447,530-	39-
13-15	1,745,026	579,447	33	65	0	579,382-	33-
14-16	1,793,029	582,817	33	65	0	582,753-	33-
15-17	1,904,398	524,456	28	65	0	524,391-	28-
16-18	2,076,661	217,777	10	1,371	0	216,406-	10-
FIVE-YEAR AVERAGE							
14-18	1,996,514	388,432	19	861	0	387,571-	19-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	173		0		0		0
1993	8,541		0		0		0
1994	6,457		0		0		0
1995	7,051		0		0		0
1996	11,784		0		0		0
1997	9,671		0		0		0
1998	1,763		0		0		0
1999	3,519		0		0		0
2000							
2001							
2002							
2003	13,584		0		0		0
2004							
2005	838		0		0		0
2006							
2007							
2008							
2009							
2010	1,205	332	28		0	332-	28-
2011	17,950	4,182	23		0	4,182-	23-
2012	69,832	16,784	24		0	16,784-	24-
2013	35,819	2,477	7		0	2,477-	7-
2014	21,440	1,529	7		0	1,529-	7-
2015	1,063	2,854	269		0	2,854-	269-
2016	8	334			0	334-	
2017	29	517			0	517-	
2018							
TOTAL	210,727	29,009	14		0	29,009-	14-

THREE-YEAR MOVING AVERAGES

92-94	5,057	0	0	0
93-95	7,350	0	0	0
94-96	8,431	0	0	0
95-97	9,502	0	0	0
96-98	7,739	0	0	0
97-99	4,984	0	0	0
98-00	1,761	0	0	0
99-01	1,173	0	0	0
00-02				
01-03	4,528	0	0	0

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	4,528	0		0		0	
03-05	4,807	0		0		0	
04-06	279	0		0		0	
05-07	279	0		0		0	
06-08							
07-09							
08-10	402	111	28	0		111-	28-
09-11	6,385	1,505	24	0		1,505-	24-
10-12	29,662	7,099	24	0		7,099-	24-
11-13	41,200	7,814	19	0		7,814-	19-
12-14	42,364	6,930	16	0		6,930-	16-
13-15	19,440	2,287	12	0		2,287-	12-
14-16	7,504	1,572	21	0		1,572-	21-
15-17	367	1,235	337	0		1,235-	337-
16-18	12	284		0		284-	
FIVE-YEAR AVERAGE							
14-18	4,508	1,047	23	0		1,047-	23-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 387.00 OTHER EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1993	673		0		0		0
1994							
1995							
1996							
1997							
1998							
1999							
2000							
2001							
2002							
2003	13,459		0		0		0
2004	7,649		0		0		0
2005	2,702	1,886	70	956	35	930-	34-
2006							
2007							
2008							
2009							
2010							
2011							
2012							
2013							
2014							
2015							
2016							
2017	3,242	23,707	731		0	23,707-	731-
2018							
TOTAL	27,725	25,593	92	956	3	24,637-	89-

THREE-YEAR MOVING AVERAGES

93-95	224		0		0		0
94-96							
95-97							
96-98							
97-99							
98-00							
99-01							
00-02							
01-03	4,486		0		0		0
02-04	7,036		0		0		0
03-05	7,937	629	8	319	4	310-	4-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 387.00 OTHER EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
04-06	3,450	629	18	319	9	310-	9-
05-07	901	629	70	319	35	310-	34-
06-08							
07-09							
08-10							
09-11							
10-12							
11-13							
12-14							
13-15							
14-16							
15-17	1,081	7,902	731		0	7,902-	731-
16-18	1,081	7,902	731		0	7,902-	731-
FIVE-YEAR AVERAGE							
14-18	648	4,741	731		0	4,741-	731-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 390.00 STRUCTURES AND IMPROVEMENTS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	44,799		0		0		0
1993	27,863		0		0		0
1994	378		0		0		0
1995	13,673		0		0		0
1996	12,585		0		0		0
1997	3,049		0		0		0
1998	121,759		0		0		0
1999	448		0		0		0
2000							
2001	117,454		0		0		0
2002							
2003	261,920	25,703	10		0	25,703-	10-
2004	391,553	3,847	1		0	3,847-	1-
2005	648	510	79	357	55	152-	24-
2006	211,676		0		0		0
2007	27,628	18,598-	67-		0	18,598	67
2008							
2009							
2010			131			131-	
2011							
2012							
2013							
2014							
2015			13,363			13,363-	
2016							
2017							
2018							
TOTAL	1,235,433	24,955	2	357	0	24,598-	2-

THREE-YEAR MOVING AVERAGES

92-94	24,347	0	0	0
93-95	13,971	0	0	0
94-96	8,879	0	0	0
95-97	9,769	0	0	0
96-98	45,798	0	0	0
97-99	41,752	0	0	0
98-00	40,736	0	0	0
99-01	39,301	0	0	0
00-02	39,151	0	0	0
01-03	126,458	8,568	7	8,568-

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 390.00 STRUCTURES AND IMPROVEMENTS

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	217,824	9,850	5		0	9,850-	5-
03-05	218,040	10,020	5	119	0	9,901-	5-
04-06	201,292	1,452	1	119	0	1,333-	1-
05-07	79,984	6,029-	8-	119	0	6,149	8
06-08	79,768	6,199-	8-		0	6,199	8
07-09	9,209	6,199-	67-		0	6,199	67
08-10		44				44-	
09-11		44				44-	
10-12		44				44-	
11-13							
12-14							
13-15		4,454				4,454-	
14-16		4,454				4,454-	
15-17		4,454				4,454-	
16-18							
FIVE-YEAR AVERAGE							
14-18		2,673				2,673-	

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 392.00 TRANSPORTATION EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	107,761		0	7,545	7	7,545	7
1993							
1994							
1995	53,481		0	1,972	4	1,972	4
1996	237,008		0	15,435	7	15,435	7
1997	256,291		0	71,193	28	71,193	28
1998	281,993		0	13,636	5	13,636	5
1999	218,438		0	22,910	10	22,910	10
2000	1,181,629		0	37,146	3	37,146	3
2001	396,470		0	67,485	17	67,485	17
2002	819,018		0	60,320	7	60,320	7
2003	633,574	53,955-	9-	1,719	0	55,674	9
2004	230,184	1,964-	1-	29,480	13	31,444	14
2005	106,510	1,148	1	602	1	546-	1-
2006	126,467		0		0		0
2007	34,135		0	2,400	7	2,400	7
2008	139,388		0	1,320	1	1,320	1
2009	18,888	17,267-	91-	2,000	11	19,267	102
2010	4,575	46,063-		47,168		93,231	
2011	71		0		0		0
2012							
2013	14,503		0	3,019	21	3,019	21
2014	242,733		0		0		0
2015	2,035		0		0		0
2016	990		0	1,953	197	1,953	197
2017	31,372		0		0		0
2018	54,028		0	6,852	13	6,852	13
TOTAL	5,191,544	118,101-	2-	394,156	8	512,257	10

THREE-YEAR MOVING AVERAGES

92-94	35,920	0	2,515	7	2,515	7	
93-95	17,827	0	657	4	657	4	
94-96	96,830	0	5,802	6	5,802	6	
95-97	182,260	0	29,533	16	29,533	16	
96-98	258,431	0	33,421	13	33,421	13	
97-99	252,241	0	35,913	14	35,913	14	
98-00	560,687	0	24,564	4	24,564	4	
99-01	598,846	0	42,514	7	42,514	7	
00-02	799,039	0	54,984	7	54,984	7	
01-03	616,354	17,985-	3-	43,175	7	61,160	10

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 392.00 TRANSPORTATION EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	560,926	18,640-	3-	30,506	5	49,146	9
03-05	323,423	18,257-	6-	10,600	3	28,857	9
04-06	154,387	272-	0	10,027	6	10,299	7
05-07	89,037	383	0	1,001	1	618	1
06-08	99,997		0	1,240	1	1,240	1
07-09	64,137	5,756-	9-	1,907	3	7,662	12
08-10	54,284	21,110-	39-	16,830	31	37,940	70
09-11	7,845	21,110-	269-	16,389	209	37,499	478
10-12	1,549	15,354-	991-	15,723		31,077	
11-13	4,858		0	1,006	21	1,006	21
12-14	85,745		0	1,006	1	1,006	1
13-15	86,424		0	1,006	1	1,006	1
14-16	81,920		0	651	1	651	1
15-17	11,466		0	651	6	651	6
16-18	28,797		0	2,935	10	2,935	10
FIVE-YEAR AVERAGE							
14-18	66,232		0	1,761	3	1,761	3

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 396.00 POWER OPERATED EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
1992	115,309	0		8,073	7	8,073	7
1993	5,890	0		5,127	87	5,127	87
1994	81,782	0		13,850	17	13,850	17
1995	69,471	0		2,561	4	2,561	4
1996	92,020	0		5,993	7	5,993	7
1997	57,243	0		15,901	28	15,901	28
1998	7,726	0		1,200	16	1,200	16
1999	81,308	0		0		0	
2000	408,371	0		0		0	
2001	61,444	0		11,074	18	11,074	18
2002	369,871	0		0		0	
2003	316,052	2,168	1	7,000	2	4,832	2
2004	100,423	10,261-	10-	2,400	2	12,661	13
2005	27,493	573	2	0		573-	2-
2006	108,994	0		0		0	
2007	77,418	3,928-	5-	2,000	3	5,928	8
2008	3,757	901-	24-	2,420	64	3,321	88
2009	43,283	0		0		0	
2010	4,875	0		15,378	315	15,378	315
2011	5,794	0		0		0	
2012	245,782	0		0		0	
2013	5,019	0		0		0	
2014	652,936	0		0		0	
2015		570		20,724		20,155	
2016	11,814	0		0		0	
2017	5,895	0		16,181	275	16,181	275
2018	35,633	0		0		0	
TOTAL	2,995,602	11,779-	0	129,883	4	141,661	5

THREE-YEAR MOVING AVERAGES

92-94	67,660	0	9,017	13	9,017	13
93-95	52,381	0	7,179	14	7,179	14
94-96	81,091	0	7,468	9	7,468	9
95-97	72,911	0	8,152	11	8,152	11
96-98	52,330	0	7,698	15	7,698	15
97-99	48,759	0	5,700	12	5,700	12
98-00	165,802	0	400	0	400	0
99-01	183,708	0	3,691	2	3,691	2
00-02	279,895	0	3,691	1	3,691	1
01-03	249,122	723	6,025	2	5,302	2

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNTS 396.00 POWER OPERATED EQUIPMENT

SUMMARY OF BOOK SALVAGE

YEAR	REGULAR RETIREMENTS	COST OF REMOVAL		GROSS SALVAGE		NET SALVAGE	
		AMOUNT	PCT	AMOUNT	PCT	AMOUNT	PCT
THREE-YEAR MOVING AVERAGES							
02-04	262,115	2,698-	1-	3,133	1	5,831	2
03-05	147,989	2,506-	2-	3,133	2	5,640	4
04-06	78,970	3,229-	4-	800	1	4,029	5
05-07	71,302	1,118-	2-	667	1	1,785	3
06-08	63,390	1,610-	3-	1,473	2	3,083	5
07-09	41,486	1,610-	4-	1,473	4	3,083	7
08-10	17,305	300-	2-	5,933	34	6,233	36
09-11	17,984	0		5,126	29	5,126	29
10-12	85,483	0		5,126	6	5,126	6
11-13	85,532	0		0		0	
12-14	301,246	0		0		0	
13-15	219,318	190	0	6,908	3	6,718	3
14-16	221,583	190	0	6,908	3	6,718	3
15-17	5,903	190	3	12,302	208	12,112	205
16-18	17,781	0		5,394	30	5,394	30
FIVE-YEAR AVERAGE							
14-18	141,256	114	0	7,381	5	7,267	5

**PART IX. DETAILED DEPRECIATION
CALCULATIONS**

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 350.20 RIGHTS OF WAY

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 50-R5						
NET SALVAGE PERCENT.. -10						
1951	11,628.81	12,779	12,792			
1955	6,299.77	6,820	6,930			
1956	6,519.66	7,037	7,172			
1979	4,240.95	3,649	4,665			
1989	30,604.31	20,158	26,331	7,334	19.76	371
1990	373,633.41	238,954	312,123	98,874	20.52	4,818
1993	136,008.40	77,827	101,658	47,951	23.52	2,039
	568,935.31	367,224	471,671	154,158		7,228
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 21.3 1.27						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 351.00 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 50-R4						
NET SALVAGE PERCENT.. -10						
1951	439.56	470	484			
1976	73.82	65	81			
1984	34.31	26	38			
1989	1,129.09	740	1,182	60	20.00	3
1990	39,591.23	25,198	40,263	3,287	20.76	158
1991	7,731.65	4,771	7,624	881	21.52	41
1993	13,077.60	7,557	12,075	2,310	23.04	100
1994	14,370.71	7,978	12,748	3,060	24.04	127
1995	26,475.01	14,165	22,634	6,489	24.81	262
	102,922.98	60,970	97,129	16,086		691
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 23.3 0.67						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 352.00 WELLS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 50-S4						
NET SALVAGE PERCENT.. -10						
1951	25,786.39	27,378	22,002	6,363	2.43	2,619
1952	4,484.19	4,723	3,796	1,137	2.94	387
1953	5,504.14	5,790	4,653	1,402	2.99	469
1954	4,064.64	4,268	3,430	1,041	3.07	339
1955	2,336.67	2,448	1,967	603	3.17	190
1956	1,996.79	2,087	1,677	519	3.29	158
1957	1,942.33	2,011	1,616	521	3.86	135
1958	1,888.04	1,948	1,565	512	4.01	128
1959	5.04	5	4	2	4.19	
1960	3,443.77	3,524	2,832	956	4.39	218
1963	2,487.36	2,506	2,014	722	5.10	142
1966	518.15	515	414	156	5.64	28
1967	503.98	497	399	155	5.97	26
1968	6,747.31	6,597	5,302	2,120	6.32	335
1971	5.90	6	6			
1980	3,700.95	3,103	2,494	1,577	12.01	131
1981	114.23	94	76	50	12.75	4
1985	7,917.31	5,922	4,759	3,950	15.76	251
1987	3,869.89	2,735	2,198	2,059	17.52	118
1989	108,186.17	71,974	57,840	61,165	19.28	3,172
1990	373,544.99	241,239	193,866	217,033	20.04	10,830
1992	99,286.89	59,621	47,913	61,303	22.04	2,781
1993	235,990.08	136,362	109,584	150,005	23.04	6,511
1994	2,909.20	1,615	1,298	1,902	24.04	79
1996	67,054.82	34,358	27,611	46,149	25.81	1,788
1997	25,181.03	12,326	9,905	17,794	26.81	664
1998	2,755.66	1,286	1,033	1,998	27.81	72
2000	42,485.37	17,899	14,384	32,350	29.81	1,085
2001	74,133.12	29,536	23,736	57,810	30.81	1,876
2002	2,529.92	951	764	2,019	31.81	63
2011	13,914.38	2,375	1,909	13,397	40.81	328
2014	94,744.46	9,713	7,806	96,413	43.81	2,201
2015	57,512.54	4,580	3,681	59,583	44.81	1,330
2016	113,459.18	6,465	5,195	119,610	45.81	2,611
	1,391,004.89	706,457	567,729	962,376		41,069
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 23.4 2.95						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 352.02 RESERVOIRS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
FULLY ACCRUED						
NET SALVAGE PERCENT.. 0						
1951	12,921.02	12,921	12,921			
1952	4,027.66	4,028	4,028			
1953	2,900.55	2,901	2,901			
1954	4,052.78	4,053	4,053			
1955	1,382.57	1,383	1,383			
1956	883.97	884	884			
1957	878.95	879	879			
1958	1,354.92	1,355	1,355			
1959	58.44	58	58			
1960	1,248.55	1,249	1,249			
1963	1,176.87	1,177	1,177			
1966	1,060.52	1,061	1,061			
1967	828.11	828	828			
1968	295.06	295	295			
1971	837.62	838	838			
1980	1,117.02	1,117	1,117			
1981	233.79	234	234			
1989	1,256.25	1,256	1,254			
	36,514.65	36,517	36,515			
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 0.0 0.00						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 353.00 PIPELINES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 60-R4						
NET SALVAGE PERCENT.. -10						
1979	6,015.67	4,339	4,118	2,499	20.74	120
1983	1.65	1	1	1	23.67	
1985	696.91	437	415	352	25.32	14
1986	159.13	97	92	83	26.32	3
1987	142.89	85	81	76	26.98	3
1989	70,460.25	39,327	37,323	40,183	28.64	1,403
1990	571,205.85	308,006	292,310	336,016	29.64	11,337
1993	216,860.55	105,247	99,883	138,664	32.30	4,293
1996	58,255.64	25,088	23,810	40,271	34.97	1,152
1997	8,709.03	3,604	3,420	6,160	35.65	173
2001	69,531.72	23,557	22,357	54,128	39.32	1,377
2002	46,586.04	14,881	14,122	37,123	40.32	921
2010	55,587.98	9,196	8,727	52,420	48.00	1,092
2011	10,436.02	1,524	1,446	10,034	48.99	205
2014	42,104.59	3,687	3,500	42,815	52.00	823
	1,156,753.92	539,076	511,605	760,824		22,916
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 33.2 1.98						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 354.00 COMPRESSOR STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 50-S2						
NET SALVAGE PERCENT.. -10						
1982	5,103.12	3,852	4,065	1,548	16.69	93
1985	623,229.93	445,541	470,209	215,344	18.05	11,930
1986	51,818.20	36,309	38,319	18,681	18.52	1,009
1987	1,215.76	834	880	457	19.01	24
1989	81,760.68	53,332	56,285	33,652	20.25	1,662
1993	295,501.64	173,253	182,845	142,207	22.34	6,366
2004	1,037,437.26	369,058	389,492	751,689	30.34	24,776
2012	160,230.89	26,015	27,455	148,799	37.55	3,963
2013	23,249.85	3,192	3,369	22,206	38.56	576
2015	131,398.95	11,476	12,111	132,428	40.56	3,265
2016	159,767.08	9,982	10,535	165,209	41.55	3,976
	2,570,713.36	1,132,844	1,195,565	1,632,220		57,640
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 28.3 2.24						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 355.00 MEASURING AND REGULATING EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 40-S3						
NET SALVAGE PERCENT.. -10						
1951	5,105.19	5,497	5,616			
1955	1,255.13	1,341	1,381			
1960	132.25	139	145			
1969	470.58	474	518			
1973	55.13	54	61			
1978	69.07	65	76			
1979	59.92	55	66			
1983	7.89	7	9			
1985	11,552.26	9,833	12,707			
1988	26,257.98	21,143	28,884			
1989	33,278.90	26,240	36,607			
1992	716.34	522	788			
1993	24,474.62	17,300	26,922			
1994	38,420.66	26,406	42,263			
1999	1,913.77	1,080	1,851	254	18.52	14
2000	54,069.37	29,048	49,776	9,700	19.38	501
2001	707.35	361	619	159	20.23	8
2003	4,782.16	2,169	3,717	1,543	22.09	70
2009	16,682.15	4,672	8,005	10,345	27.81	372
	220,010.72	146,406	220,011	22,001		965
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 22.8 0.44						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 356.00 PURIFICATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 40-R4						
NET SALVAGE PERCENT.. -10						
1951	2,128.03	2,341	2,341			
1959	1,434.19	1,577	1,578			
1960	731.04	800	804			
1969	110.81	116	122			
1982	4,964.34	4,564	5,461			
1985	116,158.19	100,584	127,774			
1986	983.65	833	1,073	9	9.70	1
1988	1,771.72	1,432	1,845	104	11.00	9
1989	74,668.62	58,875	75,863	6,272	11.65	538
1993	63,758.98	44,711	57,611	12,524	14.50	864
1994	6,653.95	4,519	5,823	1,496	15.18	99
2004	15,018.59	6,276	8,087	8,433	23.67	356
	288,382.11	226,628	288,382	28,838		1,867
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 15.4 0.65						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 357.00 OTHER EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 35-S3						
NET SALVAGE PERCENT.. -10						
1951	474.05	521	521			
1955	224.05	244	246			
1956	171.42	186	189			
1959	7.38	8	8			
1960	35.18	38	39			
1961	18.37	20	20			
1964	25.12	27	28			
1969	5,113.39	5,318	5,625			
1984	16.06	15	18			
1986	3,860.25	3,478	4,200	46	7.18	6
1989	10,725.87	9,153	11,054	744	8.52	87
1990	65,068.57	54,469	65,783	5,792	8.95	647
1992	11,851.48	9,501	11,474	1,563	9.86	159
1993	27,730.17	21,624	26,116	4,387	10.47	419
	125,321.36	104,602	125,321	12,532		1,318
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 9.5 1.05						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 367.00 MAINS - CATHODIC PROTECTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
1953	3,466.93	3,747	612	3,722	10.26	363
1961	104,346.71	106,499	17,402	113,031	12.92	8,749
1963	26,822.40	26,983	4,409	29,119	13.46	2,163
1964	81,873.00	81,433	13,306	89,035	13.99	6,364
1965	42,535.69	41,813	6,832	46,338	14.53	3,189
1977	17,160.00	14,509	2,371	19,079	19.85	961
1988	37,539.51	25,475	4,163	42,761	25.68	1,665
1989	153,832.34	101,529	16,589	175,701	26.37	6,663
1990	309,502.22	199,552	32,606	354,272	26.75	13,244
1991	273,734.79	171,255	27,983	314,185	27.45	11,446
1992	215,724.04	131,484	21,484	248,171	27.85	8,911
1993	72,993.54	43,048	7,034	84,208	28.55	2,949
1994	39,907.19	22,857	3,735	46,149	28.97	1,593
1995	89,877.95	49,635	8,110	104,237	29.69	3,511
1996	8,239.60	4,403	719	9,580	30.13	318
1997	29,119.52	14,946	2,442	33,957	30.86	1,100
2011	4,463.50	921	151	5,428	37.95	143
	1,511,138.93	1,040,089	169,948	1,718,976		73,332
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT ..						23.4 4.85

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 367.01 MAINS - STEEL

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
2010	115,654.77	26,658	23,462	121,106	37.59	3,222
	115,654.77	26,658	23,462	121,106		3,222
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT ..						37.6 2.79

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 369.00 MEASURING AND REGULATING STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 40-R2						
NET SALVAGE PERCENT.. -5						
1964	185.00	177	191	3	5.38	1
1971	1,449.88	1,316	1,419	103	7.45	14
1972	2,070.76	1,870	2,017	157	7.56	21
1983	485.94	382	412	98	11.90	8
1988	6,662.41	4,758	5,131	1,865	14.34	130
1990	3,979.46	2,715	2,928	1,250	15.36	81
1992	2,434.00	1,578	1,702	854	16.42	52
2008	99,018.69	30,567	32,962	71,008	25.21	2,817
2009	31,280.97	8,862	9,556	23,289	25.71	906
	147,567.11	52,225	56,318	98,627		4,030
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 24.5 2.73						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 374.02 RIGHTS OF WAY

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 60-R4						
NET SALVAGE PERCENT.. 0						
1945	1,890.00	1,792	1,890			
1946	640.00	603	640			
1955	495.00	446	495			
1965	3,404.04	2,805	3,404			
1983	348.00	209	260	88	23.67	4
1988	1,996.40	1,041	1,297	699	27.98	25
1989	627.50	318	396	232	28.64	8
1990	3,697.05	1,812	2,257	1,440	29.64	49
1991	10.00	5	6	4	30.30	
1992	64.00	29	36	28	31.31	1
1993	1,042.00	460	573	469	32.30	15
1998	29.25	10	12	17	36.64	
2001	357.02	110	137	220	39.32	6
2002	9,346.65	2,714	3,381	5,966	40.32	148
2003	284,043.39	77,487	96,517	187,526	41.32	4,538
2010	171.69	26	32	140	48.00	3
2013	3,645.98	355	442	3,204	50.99	63
2014	21,675.41	1,725	2,149	19,526	52.00	376
	333,483.38	91,947	113,924	219,559		5,236
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 41.9 1.57						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 375.00 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. RESERVE (4)	BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 35-S0						
NET SALVAGE PERCENT.. -5						
1931	1,320.00	1,386	1,386			
1932	840.00	882	882			
1937	181.63	191	191			
1944	234.70	246	246			
1948	1,780.00	1,869	1,869			
1950	136.50	142	143			
1953	180.00	184	189			
1957	660.00	661	693			
1958	85.00	84	89			
1959	330.00	326	346			
1961	70.00	68	74			
1962	590.00	571	620			
1963	3,379.90	3,250	3,549			
1964	369.93	351	388			
1965	9,875.00	9,319	10,369			
1966	90.00	84	94			
1967	345.00	321	362			
1968	135.00	125	142			
1969	1,475.58	1,350	1,549			
1970	725.00	657	761			
1971	646.98	581	679			
1996	2,730.21	1,658	2,154	713	16.41	43
1998	70,130.13	40,154	52,178	21,459	17.09	1,256
1999	665.00	369	479	219	17.40	13
2003	17,144.90	8,204	10,661	7,341	18.51	397
2004	11,442.45	5,226	6,791	5,224	18.83	277
2005	10,276.55	4,472	5,811	4,979	19.07	261
2006	9,232.69	3,805	4,944	4,750	19.35	245
2007	7,612.74	2,951	3,835	4,158	19.65	212
	152,684.89	89,487	111,474	48,845		2,704
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 18.1 1.77						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.00 MAINS - CATHODIC PROTECTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
1972	451.86	410	327	238	17.60	14
1974	2,578.52	2,281	1,822	1,401	18.39	76
1975	69,300.19	60,291	48,153	38,472	19.00	2,025
1976	7,966.98	6,814	5,442	4,517	19.61	230
1977	15,882.33	13,429	10,726	9,127	19.85	460
1978	13,728.76	11,398	9,103	8,058	20.48	393
1979	11,235.22	9,154	7,311	6,733	21.10	319
1980	17,489.31	14,057	11,227	10,635	21.38	497
1981	35,611.34	28,044	22,398	22,116	22.02	1,004
1982	29,955.82	23,096	18,446	18,999	22.67	838
1983	8,100.04	6,146	4,909	5,216	22.98	227
1984	9,451.74	7,011	5,600	6,215	23.64	263
1985	18,591.74	13,470	10,758	12,482	24.30	514
1986	11,328.01	8,054	6,433	7,727	24.64	314
1987	1,665.70	1,154	922	1,160	25.32	46
1988	4,859.31	3,298	2,634	3,440	25.68	134
1989	5,578.03	3,681	2,940	4,033	26.37	153
1990	7,186.16	4,633	3,700	5,283	26.75	197
1991	6,227.53	3,896	3,112	4,672	27.45	170
1992	39,152.18	23,863	19,059	29,881	27.85	1,073
1993	83,098.85	49,008	39,142	64,732	28.55	2,267
1994	26,939.72	15,430	12,324	21,351	28.97	737
1995	951.08	525	419	770	29.69	26
1996	267,561.71	142,978	114,194	220,258	30.13	7,310
1997	192,463.63	98,782	78,895	161,685	30.86	5,239
1998	945,404.99	467,503	373,386	808,370	31.32	25,810
1999	167,995.36	79,840	63,767	146,227	31.78	4,601
2000	108,178.32	49,032	39,161	96,062	32.52	2,954
2001	364,414.07	157,837	126,062	329,456	33.01	9,980
2002	264,932.84	109,285	87,284	243,882	33.50	7,280
2003	171,885.10	67,272	53,729	161,127	34.00	4,739
2004	50,047.64	18,505	14,780	47,780	34.52	1,384
2005	69,320.54	24,098	19,247	67,404	35.04	1,924
2006	127,228.43	41,349	33,024	126,012	35.58	3,542
2007	55,400.31	16,724	13,357	55,893	36.12	1,547
2008	12,251.32	3,409	2,723	12,591	36.67	343
2009	332,245.65	84,806	67,733	347,574	37.01	9,391
2010	39,161.38	9,027	7,210	41,742	37.59	1,110
2011	236,913.04	48,863	39,025	257,116	37.95	6,775
2012	41,747.92	7,567	6,044	46,141	38.34	1,203
2013	59,250.11	9,243	7,382	66,681	38.56	1,729

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.00 MAINS - CATHODIC PROTECTION

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
2014	203,513.21	26,457	21,131	233,261	38.79	6,013
2015	90,986.58	9,394	7,503	106,230	38.87	2,733
2016	138,526.90	10,476	8,366	164,793	38.82	4,245
2017	72,620.19	3,431	2,740	88,035	38.18	2,306
2018	36,123.81	623	498	44,657	35.86	1,245
	4,475,503.47	1,795,644	1,434,148	4,160,231		125,380
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT ..						33.2 2.80

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.01 MAINS - STEEL

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. RESERVE (4)	BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
1927	605.08	734	104	652	2.84	230
1928	30,529.68	36,956	5,224	32,938	2.95	11,165
1930	164,088.66	197,850	27,970	177,141	3.25	54,505
1932	3,266.74	3,885	549	3,534	4.41	801
1935	47,293.28	55,782	7,886	51,231	4.99	10,267
1936	164.13	193	27	178	5.22	34
1937	59,892.35	70,164	9,919	64,946	5.46	11,895
1939	26,201.87	30,466	4,307	28,445	5.97	4,765
1940	24,686.81	28,584	4,041	26,818	6.25	4,291
1941	5,429.47	6,259	885	5,902	6.54	902
1942	24,275.55	27,856	3,938	26,406	6.83	3,866
1943	3,729.58	4,259	602	4,060	7.14	569
1944	15,833.63	17,989	2,543	17,249	7.47	2,309
1945	4,677.66	5,286	747	5,100	7.80	654
1946	9,347.85	10,505	1,485	10,200	8.15	1,252
1947	11,234.99	12,552	1,774	12,270	8.50	1,444
1948	187,744.06	210,133	29,706	204,974	8.24	24,875
1949	63,874.96	71,029	10,041	69,803	8.62	8,098
1950	28,850.04	31,865	4,505	31,558	9.02	3,499
1951	15,410.20	16,903	2,390	16,873	9.42	1,791
1952	39,340.18	42,841	6,056	43,119	9.83	4,386
1953	84,754.33	91,598	12,949	92,994	10.26	9,064
1954	88,166.20	95,253	13,466	96,742	10.13	9,550
1955	96,532.54	103,435	14,622	106,044	10.58	10,023
1956	20,740.48	22,037	3,115	22,811	11.03	2,068
1957	52,653.72	55,458	7,840	57,977	11.49	5,046
1958	39,259.84	40,973	5,792	43,283	11.96	3,619
1959	151,626.47	157,881	22,319	167,214	11.93	14,016
1960	84,832.94	87,463	12,364	93,677	12.43	7,536
1961	120,760.96	123,252	17,424	133,527	12.92	10,335
1962	211,363.16	213,477	30,179	234,025	13.43	17,426
1963	241,206.30	242,654	34,304	267,204	13.46	19,852
1964	218,881.42	217,705	30,777	242,825	13.99	17,357
1965	153,646.41	151,034	21,351	170,707	14.53	11,749
1966	195,814.50	190,185	26,886	217,882	15.07	14,458
1967	135,790.26	131,122	18,536	151,202	15.17	9,967
1968	154,148.98	146,943	20,773	171,913	15.72	10,936
1969	416,463.83	391,684	55,372	465,208	16.29	28,558
1970	198,500.84	185,325	26,199	221,927	16.44	13,499
1971	167,167.75	153,836	21,748	187,212	17.02	11,000
1972	119,595.48	108,443	15,330	134,164	17.60	7,623

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.01 MAINS - STEEL

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. RESERVE (4)	BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
1973	215,416.09	192,367	27,195	242,075	18.19	13,308
1974	76,885.57	68,005	9,614	86,493	18.39	4,703
1975	264,553.37	230,161	32,537	298,155	19.00	15,692
1976	205,266.97	175,555	24,818	231,766	19.61	11,819
1977	104,122.70	88,036	12,446	117,707	19.85	5,930
1978	277,206.85	230,151	32,536	313,973	20.48	15,331
1979	145,133.90	118,248	16,717	164,700	21.10	7,806
1980	158,963.13	127,767	18,062	180,642	21.38	8,449
1981	101,094.78	79,612	11,255	115,113	22.02	5,228
1982	95,555.15	73,673	10,415	109,029	22.67	4,809
1983	285,361.59	216,518	30,609	326,093	22.98	14,190
1984	152,953.48	113,453	16,039	175,153	23.64	7,409
1985	151,343.03	109,648	15,501	173,678	24.30	7,147
1986	264,969.28	188,393	26,633	304,579	24.64	12,361
1987	505,935.23	350,613	49,566	582,853	25.32	23,019
1988	74,604.58	50,629	7,157	86,099	25.68	3,353
1989	395,316.51	260,909	36,884	457,262	26.37	17,340
1990	88,753.96	57,224	8,090	102,852	26.75	3,845
1991	163,069.74	102,021	14,423	189,414	27.45	6,900
1992	379,302.62	231,185	32,682	441,446	27.85	15,851
1993	308,742.81	182,081	25,740	360,189	28.55	12,616
1994	213,146.46	122,080	17,258	249,175	28.97	8,601
1995	87.11	48	7	102	29.69	3
1996	92,053.74	49,191	6,954	108,113	30.13	3,588
1997	257,435.89	132,129	18,679	303,116	30.86	9,822
1998	15,638,562.62	7,733,269	1,093,238	18,454,965	31.32	589,239
1999	247,975.35	117,850	16,660	293,309	31.78	9,229
2000	217,792.54	98,714	13,955	258,286	32.52	7,942
2001	4,677.76	2,026	286	5,561	33.01	168
2002	253,428.26	104,539	14,779	302,006	33.50	9,015
2003	238,645.73	93,400	13,204	285,103	34.00	8,385
2004	428,399.24	158,401	22,393	513,106	34.52	14,864
2005	213,005.48	74,046	10,468	255,789	35.04	7,300
2006	341,422.37	110,962	15,686	411,092	35.58	11,554
2007	45,477.96	13,729	1,941	54,906	36.12	1,520
2008	367,457.61	102,245	14,454	444,868	36.67	12,132
2009	444,196.61	113,381	16,028	539,218	37.01	14,570
2010	379,995.79	87,589	12,382	462,613	37.59	12,307
2011	941,610.95	194,207	27,455	1,149,559	37.95	30,291
2012	9,085,533.79	1,646,753	232,799	11,124,118	38.34	290,144
2013	7,252,644.79	1,131,413	159,946	8,905,860	38.56	230,961

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.01 MAINS - STEEL

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
2014	1,147,196.73	149,136	21,083	1,412,913	38.79	36,425
2015	6,782,616.78	700,305	99,001	8,379,270	38.87	215,572
2016	4,065,003.88	307,416	43,459	5,037,796	38.82	129,773
2017	1,036,191.55	48,960	6,921	1,288,318	38.18	33,743
2018	1,793,607.77	30,940	4,374	2,237,636	35.86	62,399
	59,621,101.28	20,360,827	2,878,374	71,648,003		2,351,933
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 30.5 3.94						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.02 MAINS - PLASTIC

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
1958	2,479.15	2,587	2,001	1,098	11.96	92
1962	842.53	851	658	395	13.43	29
1963	13,531.28	13,612	10,530	6,384	13.46	474
1968	1,549.44	1,477	1,143	794	15.72	51
1971	413.11	380	294	222	17.02	13
1972	25,611.03	23,223	17,964	14,050	17.60	798
1973	54,741.20	48,884	37,815	30,612	18.19	1,683
1974	39,160.66	34,638	26,795	22,156	18.39	1,205
1975	70,394.55	61,243	47,375	40,618	19.00	2,138
1976	162,958.86	139,371	107,812	95,887	19.61	4,890
1977	253,533.28	214,362	165,822	151,095	19.85	7,612
1978	246,218.07	204,423	158,134	149,639	20.48	7,307
1979	110,840.65	90,307	69,858	68,693	21.10	3,256
1980	335,283.71	269,484	208,463	210,642	21.38	9,852
1981	216,272.21	170,314	131,748	138,592	22.02	6,294
1982	171,157.69	131,963	102,082	111,865	22.67	4,934
1983	236,080.90	179,126	138,565	156,536	22.98	6,812
1984	162,279.29	120,371	93,114	109,735	23.64	4,642
1985	111,953.97	81,111	62,744	77,198	24.30	3,177
1986	214,690.80	152,645	118,080	150,284	24.64	6,099
1987	259,604.29	179,906	139,168	185,337	25.32	7,320
1988	290,203.15	196,939	152,345	210,409	25.68	8,193
1989	682,550.37	450,483	348,477	504,711	26.37	19,140
1990	584,298.63	376,727	291,422	438,951	26.75	16,409
1991	388,012.06	242,750	187,782	297,233	27.45	10,828
1992	558,870.87	340,632	263,500	435,089	27.85	15,623
1993	400,331.66	236,096	182,635	317,780	28.55	11,131
1994	561,330.88	321,502	248,702	452,962	28.97	15,636
1995	808,303.94	446,386	345,307	665,073	29.69	22,401
1996	533,689.45	285,190	220,612	446,500	30.13	14,819
1997	621,354.44	318,910	246,697	529,996	30.86	17,174
1998	29,961,511.38	14,815,967	11,461,070	25,990,819	31.32	829,847
1999	1,290,076.90	613,109	474,278	1,138,318	31.78	35,819
2000	1,296,476.38	587,628	454,567	1,166,028	32.52	35,856
2001	1,187,261.27	514,233	397,791	1,086,286	33.01	32,908
2002	1,363,067.73	562,265	434,947	1,268,888	33.50	37,877
2003	4,238,749.44	1,658,941	1,283,294	4,015,143	34.00	118,092
2004	4,428,867.29	1,637,574	1,266,765	4,269,319	34.52	123,677
2005	3,287,592.82	1,142,849	884,065	3,225,426	35.04	92,050
2006	5,426,878.64	1,763,736	1,364,359	5,419,239	35.58	152,311
2007	3,272,408.84	987,858	764,169	3,326,342	36.12	92,091

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.02 MAINS - PLASTIC

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 55-R2						
NET SALVAGE PERCENT.. -25						
2008	2,254,632.02	627,351	485,295	2,332,995	36.67	63,621
2009	3,839,393.37	980,005	758,095	4,041,147	37.01	109,191
2010	2,611,076.79	601,853	465,571	2,798,275	37.59	74,442
2011	4,511,031.58	930,400	719,722	4,919,067	37.95	129,620
2012	5,265,027.57	954,286	738,199	5,843,085	38.34	152,402
2013	5,201,381.45	811,416	627,681	5,874,046	38.56	152,335
2014	4,830,563.58	627,973	485,776	5,552,428	38.79	143,141
2015	5,577,729.21	575,901	445,495	6,526,667	38.87	167,910
2016	6,750,352.19	510,495	394,899	8,043,041	38.82	207,188
2017	6,818,685.97	322,183	249,229	8,274,128	38.18	216,714
2018	5,134,778.88	88,575	68,518	6,349,956	35.86	177,076
	116,666,085.42	36,650,491	28,351,429	117,481,178		3,374,200
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 34.8 2.89						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.03 MAINS - ANODES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
FULLY ACCRUED						
NET SALVAGE PERCENT.. 0						
1994	50,352.90	50,353	50,353			
1995	18,495.08	18,495	18,495			
1996	12,289.61	12,290	12,290			
1997	35,803.64	35,804	35,804			
1998	196,505.60	196,506	196,506			
1999	64,249.48	64,249	64,249			
2000	86,360.80	86,361	86,361			
2001	55,154.26	55,154	55,154			
2002	127,223.64	127,224	127,224			
2003	408,904.35	408,904	408,904			
	1,055,339.36	1,055,340	1,055,339			
AMORTIZED						
SURVIVOR CURVE.. 15-SQUARE						
NET SALVAGE PERCENT.. 0						
2004	254,674.22	246,186	243,562	11,113	0.50	11,113
2005	190,235.14	171,212	169,387	20,848	1.50	13,899
2006	410,128.88	341,773	338,130	71,999	2.50	28,800
2007	171,026.68	131,121	129,723	41,303	3.50	11,801
2008	523,283.61	366,299	362,394	160,889	4.50	35,753
2009	786,772.30	498,287	492,975	293,797	5.50	53,418
2010	594,238.34	336,737	333,147	261,091	6.50	40,168
2011	21,106.99	10,553	10,441	10,666	7.50	1,422
2012	21,212.87	9,192	9,094	12,119	8.50	1,426
2013	60,817.30	22,300	22,062	38,755	9.50	4,079
2014	15,185.35	4,556	4,507	10,678	10.50	1,017
2015	2,181,382.49	508,982	503,556	1,677,826	11.50	145,898
2016	512,922.15	85,489	84,578	428,344	12.50	34,268
2017	502,835.89	50,284	49,748	453,088	13.50	33,562
2018	172,738.93	5,757	5,696	167,043	14.50	11,520
	6,418,561.14	2,788,728	2,759,000	3,659,561		428,144
	7,473,900.50	3,844,068	3,814,339	3,659,561		428,144
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 8.5 5.73						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 376.04 MAINS - LEAK CLAMPS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRAUL (7)
FULLY ACCRUED						
NET SALVAGE PERCENT.. 0						
1994	20,193.82	20,194	20,194			
1995	78,198.29	78,198	78,198			
1996	116,934.08	116,934	116,934			
1997	48,329.41	48,329	48,329			
1998	17,516.00	17,516	17,516			
1999	660,411.07	660,411	660,411			
2000	859,273.18	859,273	859,273			
2001	1,457,481.07	1,457,481	1,457,481			
2002	914,149.13	914,149	914,149			
2003	385,914.82	385,915	385,915			
2004	871,906.95	871,907	871,907			
	5,430,307.82	5,430,307	5,430,308			
AMORTIZED						
SURVIVOR CURVE.. 14-SQUARE						
NET SALVAGE PERCENT.. 0						
2005	71,141.93	68,601	68,232	2,910	0.50	2,910
2006	289,711.90	258,672	257,279	32,433	1.50	21,622
2007	92,328.50	75,841	75,433	16,896	2.50	6,758
2008	505,882.43	379,412	377,369	128,513	3.50	36,718
2010	284,511.70	172,738	171,808	112,704	5.50	20,492
2011	113,809.35	60,969	60,641	53,169	6.50	8,180
2012	54,080.74	25,109	24,974	29,107	7.50	3,881
2013	255,532.78	100,389	99,848	155,684	8.50	18,316
2014	165,029.09	53,045	52,759	112,270	9.50	11,818
2015	308,034.27	77,009	76,594	231,440	10.50	22,042
2016	183,911.97	32,841	32,664	151,248	11.50	13,152
2017	338,443.96	36,261	36,066	302,378	12.50	24,190
2018	364,129.76	13,003	12,933	351,197	13.50	26,015
	3,026,548.38	1,353,890	1,346,600	1,679,948		216,094
	8,456,856.20	6,784,197	6,776,908	1,679,948		216,094
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 7.8 2.56						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 35-S0						
NET SALVAGE PERCENT.. -10						
1935	67.50	74	74			
1940	187.00	206	206			
1941	173.83	191	191			
1943	70.02	77	77			
1945	285.87	314	314			
1946	2,487.37	2,736	2,736			
1947	680.33	748	748			
1949	240.00	264	264			
1950	500.52	547	355	196	0.47	196
1951	155.17	168	109	62	0.99	62
1952	211.52	229	149	84	1.07	79
1953	1,954.00	2,098	1,361	788	1.61	489
1954	878.24	935	606	360	2.17	166
1955	310.09	329	213	128	2.29	56
1956	383.00	403	261	160	2.86	56
1957	1,776.55	1,863	1,208	746	3.02	247
1958	2,220.75	2,306	1,495	948	3.60	263
1959	2,336.75	2,416	1,567	1,003	3.79	265
1960	1,647.92	1,697	1,101	712	4.00	178
1961	1,859.53	1,894	1,228	817	4.61	177
1962	5,168.07	5,236	3,396	2,289	4.85	472
1963	939.17	946	613	420	5.10	82
1964	3,522.21	3,505	2,273	1,601	5.74	279
1965	7,290.93	7,208	4,674	3,346	6.02	556
1966	7,912.51	7,768	5,038	3,666	6.32	580
1967	13,041.76	12,708	8,241	6,105	6.64	919
1968	12,205.38	11,797	7,650	5,776	6.97	829
1969	11,539.20	11,058	7,171	5,522	7.32	754
1970	14,106.96	13,396	8,687	6,831	7.68	889
1971	12,789.70	12,029	7,801	6,268	8.06	778
1972	2,359.07	2,196	1,424	1,171	8.45	139
1973	5,796.09	5,338	3,462	2,914	8.85	329
1974	10,732.11	9,824	6,371	5,434	8.97	606
1975	7,939.92	7,181	4,657	4,077	9.41	433
1976	80,060.19	71,492	46,363	41,703	9.85	4,234
1977	13,997.47	12,396	8,039	7,358	10.05	732
1978	48,395.49	42,258	27,405	25,830	10.52	2,455
1979	7,537.39	6,517	4,226	4,065	10.75	378
1980	47,594.08	40,511	26,272	26,081	11.25	2,318
1981	25,009.48	21,045	13,648	13,862	11.52	1,203
1982	21,519.03	17,886	11,599	12,072	11.81	1,022

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 378.00 MEASURING AND REGULATING STATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 35-S0						
NET SALVAGE PERCENT.. -10						
1983	20,112.26	16,493	10,696	11,427	12.12	943
1984	38,153.13	30,838	19,999	21,969	12.45	1,765
1985	8,382.23	6,672	4,327	4,893	12.80	382
1986	24,384.62	19,093	12,382	14,441	13.16	1,097
1987	24,379.85	18,754	12,162	14,656	13.55	1,082
1988	32,927.65	24,967	16,191	20,029	13.75	1,457
1989	22,131.06	16,447	10,666	13,678	14.17	965
1990	15,828.60	11,561	7,497	9,914	14.42	688
1991	10,184.60	7,271	4,715	6,488	14.87	436
1992	39,481.71	27,621	17,912	25,518	15.17	1,682
1993	24,113.42	16,504	10,703	15,822	15.48	1,022
1994	25,418.72	16,989	11,017	16,944	15.82	1,071
1995	20,620.61	13,487	8,746	13,937	16.02	870
1996	7,682.57	4,886	3,169	5,282	16.41	322
1997	37,565.24	23,277	15,095	26,227	16.67	1,573
1998	1,818,546.89	1,090,819	707,401	1,293,001	17.09	75,658
1999	8,666.77	5,037	3,267	6,266	17.40	360
2000	26,585.45	14,985	9,718	19,526	17.60	1,109
2001	139,393.93	75,670	49,072	104,261	17.96	5,805
2002	51,946.11	27,153	17,609	39,532	18.22	2,170
2003	63,200.38	31,680	20,545	48,975	18.51	2,646
2004	37,661.68	18,021	11,687	29,741	18.83	1,579
2005	32,471.19	14,802	9,599	26,119	19.07	1,370
2006	93,369.07	40,312	26,143	76,563	19.35	3,957
2007	124,274.67	50,470	32,730	103,972	19.65	5,291
2008	70,354.29	26,730	17,334	60,056	19.90	3,018
2009	180,245.56	63,665	41,287	156,983	20.09	7,814
2010	6,918.97	2,238	1,451	6,160	20.40	302
2011	673,228.78	197,727	128,227	612,325	20.59	29,739
2012	218,962.06	57,300	37,159	203,699	20.82	9,784
2013	113,064.89	25,795	16,728	107,643	21.02	5,121
2014	161,785.37	31,233	20,255	157,709	21.14	7,460
2015	919,887.52	142,675	92,526	919,350	21.32	43,121
2016	23,436.87	2,694	1,747	24,034	21.42	1,122
2017	112,897.21	8,122	5,267	118,920	21.44	5,547
	5,606,146.10	2,523,778	1,638,302	4,528,459		250,549

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 18.1 4.47

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 40-R2						
NET SALVAGE PERCENT.. -5						
1937	514.34	540	540			
1939	310.00	326	326			
1940	467.95	491	491			
1942	164.10	172	172			
1943	32.50	34	34			
1944	94.61	99	99			
1945	20.00	21	21			
1947	40.50	42	28	15	0.45	15
1948	294.47	305	200	109	0.93	109
1949	724.95	751	492	269	0.92	269
1950	297.40	306	200	112	1.43	78
1951	197.30	201	132	75	1.94	39
1952	1,193.71	1,217	797	456	1.99	229
1953	30.00	31	20	12	2.07	6
1954	184.29	186	122	72	2.62	27
1955	162.07	163	107	63	2.73	23
1956	365.27	364	238	146	3.29	44
1962	425.15	411	269	177	4.85	36
1963	237.74	229	150	100	5.10	20
1964	1,572.07	1,502	984	667	5.38	124
1965	3,524.55	3,346	2,191	1,510	5.67	266
1968	321.97	300	196	142	6.32	22
1970	579.91	532	348	261	7.06	37
1971	345.24	313	205	158	7.45	21
1975	677.45	591	387	324	8.86	37
1976	1,824.31	1,579	1,034	882	9.05	97
1977	2,011.89	1,718	1,125	987	9.52	104
1978	2,529.06	2,140	1,401	1,255	9.75	129
1979	11,621.84	9,689	6,345	5,858	10.25	572
1980	13,193.11	10,827	7,090	6,763	10.76	629
1981	17,354.90	14,077	9,219	9,004	11.04	816
1982	10,951.67	8,730	5,717	5,782	11.58	499
1983	1,000.91	787	515	536	11.90	45
1984	808.15	624	409	440	12.45	35
1985	3,413.90	2,582	1,691	1,894	13.01	146
1986	25,599.09	19,044	12,471	14,408	13.37	1,078
1987	32,203.02	23,433	15,346	18,467	13.95	1,324
1988	1,498.48	1,070	701	872	14.34	61
1989	42,897.26	29,899	19,580	25,462	14.94	1,704
1990	22,824.63	15,573	10,198	13,768	15.36	896
1991	45,105.56	29,956	19,617	27,744	15.98	1,736

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 379.00 MEASURING AND REGULATING STATION EQUIPMENT - CITY GATE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 40-R2						
NET SALVAGE PERCENT.. -5						
1992	51,164.31	33,168	21,721	32,002	16.42	1,949
1993	84,933.22	53,668	35,146	54,034	16.87	3,203
1994	6,604.87	4,044	2,648	4,287	17.52	245
1995	3,236.33	1,925	1,261	2,137	17.99	119
1996	8,423.66	4,836	3,167	5,678	18.65	304
1997	19,348.12	10,745	7,037	13,279	19.15	693
1998	1,194,985.70	640,417	419,392	835,343	19.66	42,489
1999	52,536.47	27,107	17,752	37,411	20.18	1,854
2000	11,002.79	5,451	3,570	7,983	20.71	385
2001	82,182.60	38,814	25,418	60,874	21.41	2,843
2002	19,495.93	8,782	5,751	14,720	21.96	670
2003	15,203.31	6,507	4,261	11,702	22.52	520
2004	26,765.62	10,840	7,099	21,005	23.09	910
2005	58,465.04	22,376	14,653	46,735	23.54	1,985
2006	16,163.40	5,791	3,792	13,180	24.13	546
2007	22,508.77	7,501	4,912	18,722	24.73	757
2008	208,232.02	64,281	42,096	176,548	25.21	7,003
2009	24,877.14	7,047	4,615	21,506	25.71	836
2010	6,954.39	1,788	1,171	6,131	26.22	234
2011	67,340.04	15,485	10,141	60,566	26.75	2,264
2012	23,114.37	4,684	3,067	21,203	27.17	780
2013	63,827.86	11,132	7,290	59,729	27.61	2,163
2014	89,625.83	13,043	8,542	85,565	27.97	3,059
2015	973,218.44	113,020	74,014	947,865	28.15	33,672
2016	85,982.33	7,331	4,800	85,481	28.27	3,024
2017	6,859.14	366	240	6,962	28.00	249
2018	33,528.83	655	429	34,776	26.45	1,315
	3,504,195.85	1,305,005	855,193	2,824,213		125,344
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT ..						22.5 3.58

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 44-R2						
NET SALVAGE PERCENT.. -40						
1928	8.95	13	13			
1935	6.22	9	9			
1936	7.43	10	10			
1939	264.40	368	345	25	0.50	25
1940	73.61	102	96	7	0.87	7
1941	67.03	92	86	8	1.24	6
1942	166.69	230	216	17	1.02	17
1943	25.95	36	36			
1944	116.86	160	150	14	1.83	8
1945	415.28	564	529	52	2.26	23
1946	782.04	1,064	998	97	2.13	46
1947	1,386.94	1,874	1,758	184	2.58	71
1948	2,107.37	2,829	2,654	296	3.03	98
1949	2,875.16	3,861	3,623	402	2.96	136
1950	3,449.43	4,598	4,314	515	3.44	150
1951	3,879.24	5,132	4,815	616	3.93	157
1952	4,724.24	6,246	5,860	754	3.92	192
1953	4,835.14	6,340	5,948	821	4.43	185
1954	4,258.72	5,576	5,232	730	4.47	163
1955	5,163.39	6,702	6,288	941	4.99	189
1956	6,813.80	8,824	8,279	1,260	5.07	249
1957	3,623.79	4,680	4,391	682	5.17	132
1958	3,724.40	4,764	4,470	744	5.72	130
1959	5,779.32	7,366	6,911	1,180	5.86	201
1960	6,442.04	8,178	7,673	1,346	6.01	224
1961	4,797.17	6,024	5,652	1,064	6.60	161
1962	6,288.39	7,859	7,374	1,430	6.79	211
1963	20,211.25	25,127	23,575	4,721	7.00	674
1964	8,019.33	9,912	9,300	1,927	7.23	267
1965	6,987.72	8,531	8,004	1,779	7.85	227
1966	10,203.91	12,374	11,610	2,675	8.11	330
1967	18,032.75	21,711	20,370	4,876	8.38	582
1968	7,385.60	8,824	8,279	2,061	8.67	238
1969	9,832.82	11,651	10,931	2,835	8.98	316
1970	3,367.28	3,955	3,711	1,003	9.31	108
1971	3,400.80	3,957	3,713	1,048	9.65	109
1972	14,431.85	16,628	15,601	4,604	10.00	460
1973	19,621.50	22,372	20,990	6,480	10.37	625
1974	29,128.98	32,845	30,816	9,965	10.75	927
1975	31,378.01	34,968	32,808	11,121	11.15	997
1976	36,919.34	40,636	38,126	13,561	11.56	1,173

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 44-R2						
NET SALVAGE PERCENT.. -40						
1977	45,667.85	49,614	46,549	17,386	11.98	1,451
1978	60,532.15	64,864	60,857	23,888	12.41	1,925
1979	50,744.55	53,594	50,283	20,759	12.86	1,614
1980	68,920.44	71,691	67,263	29,226	13.32	2,194
1981	61,362.28	62,815	58,935	26,972	13.78	1,957
1982	47,929.89	48,246	45,266	21,836	14.26	1,531
1983	62,784.08	62,091	58,256	29,642	14.75	2,010
1984	74,245.07	72,074	67,622	36,321	15.25	2,382
1985	68,940.21	65,631	61,577	34,939	15.76	2,217
1986	97,952.24	91,358	85,715	51,418	16.28	3,158
1987	184,373.97	168,297	157,901	100,223	16.81	5,962
1988	307,388.58	274,301	257,357	172,987	17.35	9,970
1989	506,860.46	441,658	414,376	295,229	17.90	16,493
1990	445,827.16	378,864	355,461	268,697	18.45	14,564
1991	456,408.04	377,760	354,425	284,546	19.01	14,968
1992	440,558.34	356,315	334,305	282,477	19.37	14,583
1993	493,018.84	387,217	363,298	326,928	19.95	16,387
1994	675,394.13	514,286	482,518	463,034	20.55	22,532
1995	1,909,093.77	1,406,926	1,320,019	1,352,712	21.14	63,988
1996	988,033.04	703,381	659,933	723,313	21.75	33,256
1997	1,122,169.31	773,579	725,794	845,243	22.17	38,126
1998	16,997,639.07	11,270,115	10,573,952	13,222,743	22.79	580,199
1999	1,803,834.59	1,147,527	1,076,643	1,448,725	23.42	61,858
2000	2,116,824.82	1,293,888	1,213,964	1,749,591	23.87	73,297
2001	2,644,626.71	1,542,082	1,446,826	2,255,651	24.52	91,992
2002	3,114,827.80	1,733,838	1,626,738	2,734,021	25.00	109,361
2003	1,489,451.42	785,298	736,790	1,348,442	25.65	52,571
2004	2,676,875.29	1,336,778	1,254,204	2,493,421	26.15	95,351
2005	1,520,358.08	715,602	671,399	1,457,102	26.66	54,655
2006	4,593,433.90	2,025,704	1,900,575	4,530,232	27.18	166,675
2007	1,457,085.82	598,105	561,160	1,478,760	27.72	53,346
2008	1,296,884.75	491,857	461,475	1,354,164	28.26	47,918
2009	3,442,691.92	1,195,303	1,121,468	3,698,301	28.81	128,369
2010	1,210,998.00	381,803	358,219	1,337,178	29.24	45,731
2011	1,939,284.58	547,887	514,043	2,200,955	29.67	74,181
2012	1,618,065.83	401,863	377,040	1,888,252	30.13	62,670
2013	2,909,003.90	620,665	582,326	3,490,279	30.60	114,061
2014	3,031,605.81	540,717	507,316	3,736,932	30.83	121,211
2015	6,865,689.72	972,731	912,645	8,699,321	31.10	279,721

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 380.00 SERVICES

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 44-R2						
NET SALVAGE PERCENT.. -40						
2016	5,489,254.63	572,529	537,163	7,147,793	31.06	230,129
2017	4,866,308.52	316,797	297,228	6,515,604	30.76	211,821
2018	2,786,125.03	66,310	62,214	3,838,361	29.00	132,357
	82,330,078.73	35,328,953	33,146,662	82,115,448		3,068,556
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 26.8 3.73						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 20-R3						
NET SALVAGE PERCENT.. 0						
1974	20,259.23	20,259	20,259			
1975	8,863.72	8,864	8,864			
1976	14,983.45	14,983	14,983			
1977	31,402.96	31,403	31,403			
1978	61,285.98	61,286	61,286			
1979	34,925.65	34,926	34,926			
1980	73,771.89	73,772	73,772			
1981	92,233.91	92,234	92,234			
1982	56,370.62	56,371	56,371			
1983	51,054.57	51,055	51,055			
1984	52,046.44	52,046	52,046			
1985	116,683.76	116,684	116,684			
1986	176,583.82	176,195	176,584			
1987	107,580.85	106,075	107,581			
1988	69,275.91	67,821	69,276			
1989	205,791.47	199,124	205,791			
1990	412,314.17	395,987	412,314			
1991	345,967.17	328,254	345,967			
1992	1,089,184.63	1,024,705	1,089,185			
1993	432,071.59	401,049	432,072			
1994	80,409.04	73,679	80,409			
1995	438,328.42	396,600	438,328			
1996	208,672.04	185,468	208,672			
1997	4,239.55	3,701	4,240			
1998	4,239,918.40	3,615,802	4,239,918			
1999	148,378.68	123,258	148,379			
2000	281,603.59	227,141	281,604			
2002	700,782.72	527,269	700,783			
2003	346,438.79	249,713	343,205	3,234	6.00	539
2004	555,680.57	381,919	524,909	30,772	6.60	4,662
2005	383,239.81	249,872	343,424	39,816	7.20	5,530
2006	536,062.56	329,035	452,225	83,838	7.87	10,653
2007	495,516.24	284,327	390,779	104,737	8.54	12,264
2008	514,300.51	273,814	376,330	137,971	9.22	14,964
2009	811,685.37	397,076	545,741	265,944	9.92	26,809
2010	497,789.33	220,869	303,562	194,227	10.66	18,220
2011	135,735.63	53,955	74,156	61,580	11.37	5,416
2012	1,179,402.08	411,611	565,717	613,685	12.12	50,634
2013	1,096,138.41	327,307	449,850	646,288	12.92	50,022
2014	3,843,674.54	951,309	1,307,478	2,536,197	13.68	185,395
2015	1,874,907.12	364,857	501,459	1,373,448	14.49	94,786

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 381.00 METERS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 20-R3						
NET SALVAGE PERCENT.. 0						
2016	1,294,418.72	182,254	250,490	1,043,929	15.26	68,410
2017	3,000,490.64	256,542	352,590	2,647,901	16.04	165,081
2018	2,327,353.84	67,959	93,403	2,233,951	16.65	134,171
	28,447,818.39	13,468,430	16,430,304	12,017,514		847,556
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT ..						14.2 2.98

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 382.00 METER INSTALLATIONS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 25-R1.5						
NET SALVAGE PERCENT.. -5						
1981	15.00	14	9	7	3.31	2
1982	16.74	16	11	7	3.66	2
1983	1,454.44	1,377	932	595	3.87	154
1984	78.60	74	50	33	4.11	8
1985	70.96	66	45	30	4.38	7
1986	2,146.56	1,970	1,333	921	4.68	197
1987	409.73	371	251	179	5.00	36
1988	352.38	315	213	157	5.34	29
1989	1,153.19	1,018	689	522	5.59	93
1990	3,489.97	3,029	2,049	1,615	5.98	270
1991	3,054.50	2,611	1,767	1,440	6.28	229
1992	2,978.46	2,503	1,694	1,433	6.61	217
1993	2,309.87	1,899	1,285	1,140	7.07	161
1994	26,724.73	21,517	14,558	13,503	7.45	1,812
1995	131,055.99	103,152	69,792	67,817	7.85	8,639
1996	359,998.84	276,393	187,007	190,992	8.27	23,095
1997	69,138.64	51,819	35,061	37,535	8.62	4,354
1998	1,984,791.97	1,444,025	977,024	1,107,008	9.09	121,783
1999	103,525.24	72,917	49,335	59,367	9.57	6,203
2000	889,056.11	606,221	410,168	523,341	9.99	52,386
2001	2,042,875.93	1,340,208	906,782	1,238,238	10.51	117,815
2002	1,434,458.48	904,613	612,059	894,122	10.97	81,506
2003	1,089,941.51	658,052	445,237	699,202	11.46	61,012
2004	2,018,946.37	1,161,914	786,148	1,333,746	11.96	111,517
2005	747,654.51	409,083	276,785	508,252	12.41	40,955
2006	1,853,313.12	958,395	648,448	1,297,531	12.88	100,740
2007	531,707.74	258,099	174,629	383,664	13.38	28,674
2008	1,019,470.04	462,003	312,590	757,854	13.83	54,798
2009	2,778,559.11	1,164,077	787,612	2,129,875	14.31	148,838
2010	524,347.89	201,232	136,153	414,412	14.76	28,077
2011	1,239,142.48	430,404	291,210	1,009,890	15.17	66,572
2012	823,678.35	254,615	172,272	692,590	15.58	44,454
2013	423,509.62	114,195	77,264	367,421	15.91	23,094
2014	442,715.39	101,059	68,376	396,475	16.20	24,474
2015	1,880,678.20	347,549	235,151	1,739,561	16.38	106,200

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 382.00 METER INSTALLATIONS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 25-R1.5						
NET SALVAGE PERCENT.. -5						
2016	2,030,317.15	281,828	190,685	1,941,148	16.40	118,363
2017	1,604,619.99	143,549	97,125	1,587,726	16.11	98,555
2018	2,046,676.27	71,347	48,273	2,100,737	14.58	144,083
	28,114,434.07	11,853,529	8,020,072	21,500,084		1,619,404
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 13.3 5.76						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 383.00 HOUSE REGULATORS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 25-R1.5						
NET SALVAGE PERCENT.. -5						
1927	112.38	118	118			
1928	9.05	10	10			
1930	77.00	81	81			
1931	14.00	15	15			
1934	103.00	108	108			
1935	22.00	23	23			
1937	365.28	384	384			
1939	118.22	124	124			
1940	26.46	28	28			
1941	99.17	104	104			
1942	34.00	36	36			
1944	35.85	38	38			
1945	34.13	36	36			
1946	219.97	231	231			
1947	393.76	413	413			
1948	336.56	353	353			
1949	138.48	145	145			
1950	286.97	301	301			
1951	339.54	357	357			
1952	315.96	332	332			
1953	787.12	826	826			
1954	533.91	561	561			
1955	509.62	535	535			
1956	864.37	908	908			
1957	295.50	310	310			
1958	47.50	50	50			
1959	72.56	76	76			
1960	327.24	344	344			
1961	644.56	677	677			
1962	726.35	763	763			
1963	941.17	988	988			
1964	362.82	381	381			
1965	321.10	337	337			
1966	643.84	676	676			
1967	417.12	438	438			
1968	1,572.15	1,651	1,651			
1969	2,170.51	2,279	2,279			
1970	979.74	1,018	156	873	0.52	873
1971	1,754.36	1,811	277	1,565	0.81	1,565
1972	709.53	727	111	634	1.12	566
1973	11,546.13	11,750	1,796	10,327	1.45	7,122

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 383.00 HOUSE REGULATORS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. RESERVE (4)	BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 25-R1.5						
NET SALVAGE PERCENT.. -5						
1974	805.77	813	124	722	1.80	401
1975	1,538.49	1,546	236	1,379	1.95	707
1976	6,711.68	6,709	1,026	6,021	2.14	2,814
1977	2,562.40	2,546	389	2,302	2.36	975
1978	4,433.70	4,374	669	3,986	2.60	1,533
1979	6,273.50	6,141	939	5,648	2.87	1,968
1980	16,292.18	15,807	2,417	14,690	3.17	4,634
1981	8,401.05	8,105	1,239	7,582	3.31	2,291
1982	11,415.67	10,893	1,665	10,321	3.66	2,820
1983	20,810.95	19,703	3,012	18,839	3.87	4,868
1984	4,581.69	4,299	657	4,154	4.11	1,011
1985	18,934.66	17,583	2,688	17,193	4.38	3,925
1986	20,023.27	18,380	2,810	18,214	4.68	3,892
1987	18,316.97	16,600	2,538	16,695	5.00	3,339
1988	30,753.36	27,480	4,201	28,090	5.34	5,260
1989	40,245.81	35,531	5,432	36,826	5.59	6,588
1990	27,830.35	24,152	3,692	25,530	5.98	4,269
1991	36,048.28	30,810	4,710	33,141	6.28	5,277
1992	9,113.73	7,658	1,171	8,398	6.61	1,270
1993	24,129.20	19,833	3,032	22,304	7.07	3,155
1994	3,795.04	3,056	467	3,518	7.45	472
1995	11,117.91	8,751	1,338	10,336	7.85	1,317
1996	32,721.17	25,122	3,841	30,516	8.27	3,690
1997	31,098.00	23,308	3,563	29,090	8.62	3,375
1998	1,427,821.02	1,038,804	158,814	1,340,398	9.09	147,459
1999	48,988.39	34,504	5,275	46,163	9.57	4,824
2000	2,223.91	1,516	232	2,103	9.99	211
2002	90,656.64	57,171	8,741	86,448	10.97	7,880
2009	2,336.47	979	150	2,303	14.31	161
2011	785.59	273	42	783	15.17	52
2012	3,564.03	1,102	168	3,574	15.58	229
2013	1,201.35	324	49	1,212	15.91	76
2014	1,686.23	385	59	1,712	16.20	106
2015	6.79	1		7	16.38	
2016	65.56	9	1	68	16.40	4
2018	14,208.21	495	76	14,843	14.58	1,018
	2,010,808.00	1,505,106	242,840	1,868,508		241,997

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 7.7 12.03

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 384.00 HOUSE REGULATOR INSTALLATIONS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 25-R1.5						
NET SALVAGE PERCENT.. -5						
1973	395.64	403	333	82	1.45	57
1974	160.63	162	134	35	1.80	19
1975	1,224.75	1,231	1,018	268	1.95	137
1976	1,450.59	1,450	1,199	324	2.14	151
1977	569.01	565	467	130	2.36	55
1978	488.46	482	398	115	2.60	44
1979	498.43	488	403	120	2.87	42
1980	996.14	966	799	247	3.17	78
1981	514.56	496	410	130	3.31	39
1982	242.85	232	192	63	3.66	17
1983	217.74	206	170	59	3.87	15
1984	11,655.86	10,936	9,041	3,198	4.11	778
1987	26,344.55	23,875	19,737	7,925	5.00	1,585
1988	38,565.32	34,460	28,488	12,006	5.34	2,248
1989	20,690.18	18,266	15,100	6,625	5.59	1,185
1991	48,652.10	41,583	34,376	16,709	6.28	2,661
1992	32,706.41	27,484	22,721	11,621	6.61	1,758
1993	24,088.25	19,799	16,368	8,925	7.07	1,262
	209,461.47	183,084	151,354	68,581		12,131
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 5.7 5.79						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 385.00 INDUSTRIAL MEASURING AND REGULATING EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 30-R1.5						
NET SALVAGE PERCENT.. -10						
1928	49.19	54	54			
1973	402.25	407	343	99	4.00	25
1974	208.52	209	176	53	4.28	12
1975	502.57	503	424	129	4.34	30
1976	4,124.08	4,087	3,441	1,095	4.67	234
1977	86.00	84	71	24	5.01	5
1979	2,354.32	2,271	1,912	678	5.55	122
1981	1,702.03	1,608	1,354	518	6.17	84
1982	3,161.71	2,958	2,491	987	6.42	154
1983	845.48	783	659	271	6.69	41
1984	4,824.24	4,412	3,715	1,592	7.00	227
1985	325.32	294	248	110	7.31	15
1986	9,643.20	8,584	7,228	3,380	7.66	441
1987	534.94	469	395	193	8.02	24
1989	13,040.53	11,045	9,300	5,045	8.81	573
1990	4,102.08	3,408	2,870	1,642	9.24	178
1991	2,528.11	2,057	1,732	1,049	9.67	108
1992	4,286.90	3,411	2,872	1,844	10.13	182
1993	2,058.44	1,605	1,351	913	10.47	87
1994	10,275.82	7,810	6,576	4,727	10.96	431
2001	321,146.84	194,718	163,962	189,300	14.25	13,284
2002	12,081.28	7,017	5,909	7,380	14.75	500
2003	9,696.91	5,374	4,525	6,142	15.27	402
2004	149,447.28	78,908	66,444	97,948	15.71	6,235
2005	50,951.52	25,501	21,473	34,574	16.17	2,138
2006	362.74	171	144	255	16.65	15
2007	4,883.84	2,156	1,815	3,557	17.15	207
2008	10,340.73	4,252	3,580	7,795	17.59	443
2009	67,850.16	25,734	21,669	52,966	18.05	2,934
2010	54,736.90	18,990	15,991	44,220	18.45	2,397
2011	448,201.61	140,511	118,317	374,705	18.82	19,910
2012	125,890.28	35,105	29,560	108,919	19.14	5,691
2013	151,879.25	36,855	31,034	136,033	19.44	6,998
2014	111,757.15	22,902	19,284	103,649	19.65	5,275
2015	224,003.87	37,158	31,289	215,115	19.70	10,920
2016	22,009.97	2,736	2,304	21,907	19.62	1,117
	1,830,296.06	694,147	584,512	1,428,814		81,439

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 17.5 4.45

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 387.00 OTHER EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (3)	BOOK ACCRUALS (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 20-R4							
NET SALVAGE PERCENT.. -5							
1997	13,293.99	12,665	13,959				
2002	372,911.02	304,944	390,769	788	4.69	168	
2003	124,861.54	97,752	125,263	5,842	5.29	1,104	
2004	92,337.24	68,605	87,914	9,040	5.99	1,509	
2005	7,086.27	4,972	6,371	1,070	6.70	160	
2012	3,144.67	1,127	1,444	1,858	12.55	148	
2013	985.27	300	384	651	13.48	48	
2017	13,834.28	1,156	1,482	13,044	17.33	753	
	628,454.28	491,521	627,586	32,291		3,890	

COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 8.3 0.62

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 390.00 STRUCTURES AND IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 40-R1.5						
NET SALVAGE PERCENT.. -5						
1976	1,007.56	845	668	390	10.69	36
1977	7,352.11	6,119	4,838	2,882	10.86	265
1987	15,806.99	11,188	8,845	7,752	15.23	509
1988	12,030.24	8,360	6,609	6,023	15.59	386
1989	2,710.70	1,847	1,460	1,386	15.95	87
1990	9,111.10	6,053	4,786	4,781	16.55	289
1991	1,057.86	687	543	568	16.94	34
1992	11,414.28	7,210	5,700	6,285	17.55	358
1993	7,287.20	4,488	3,548	4,104	17.98	228
1994	11,750.70	7,043	5,568	6,770	18.42	368
1995	10,609.48	6,178	4,884	6,256	18.87	332
1996	7,547.60	4,262	3,370	4,555	19.34	236
1997	8,781.87	4,798	3,793	5,428	19.82	274
1998	20,003.16	10,548	8,339	12,664	20.32	623
2000	27,679.66	13,497	10,671	18,393	21.34	862
2001	12,021.20	5,611	4,436	8,186	21.87	374
2002	429,717.52	192,077	151,858	299,345	22.26	13,448
2003	66,566.82	28,280	22,359	47,536	22.81	2,084
2004	21,153.62	8,534	6,747	15,464	23.24	665
2005	74,765.13	28,512	22,542	55,961	23.67	2,364
2006	210,659.88	75,471	59,668	161,525	24.13	6,694
2007	78,642.31	26,399	20,871	61,703	24.47	2,522
2008	16,563.29	5,169	4,087	13,304	24.83	536
2009	333,424.58	95,786	75,730	274,366	25.22	10,879
2010	211,617.59	55,327	43,742	178,456	25.63	6,963
2011	245,470.74	57,992	45,849	211,895	25.83	8,203
2013	5,219.13	949	750	4,730	26.25	180
2014	21,137.02	3,245	2,566	19,628	26.27	747
2015	242,488.20	29,942	23,672	230,941	26.26	8,794
2016	49,274.39	4,553	3,600	48,138	25.91	1,858
2017	5,999.01	355	281	6,018	25.10	240
2018	21,795.77	499	394	22,492	22.49	1,000
	2,200,666.71	711,824	562,774	1,747,926		72,438
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 24.1 3.29						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 390.09 LEASEHOLD IMPROVEMENTS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 30-R2						
NET SALVAGE PERCENT.. 0						
1996	36,876.21	24,810	21,269	15,607	10.94	1,427
1997	2,136.92	1,392	1,193	944	11.50	82
	39,013.13	26,202	22,462	16,551		1,509
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 11.0 3.87						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 391.00 OFFICE FURNITURE AND EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 15-SQUARE						
NET SALVAGE PERCENT.. 0						
2004	1,426.92	1,379	1,378	49	0.50	49
2005	878.82	791	790	89	1.50	59
2006	242,856.55	202,380	202,251	40,606	2.50	16,242
2007	3,687.62	2,827	2,825	863	3.50	247
2008	15,648.90	10,954	10,947	4,702	4.50	1,045
2009	39,311.71	24,897	24,881	14,431	5.50	2,624
2010	77,692.21	44,026	43,998	33,694	6.50	5,184
2011	23,949.11	11,975	11,967	11,982	7.50	1,598
2012	3,478.09	1,507	1,506	1,972	8.50	232
2013	5,931.37	2,175	2,174	3,757	9.50	395
2014	37,785.12	11,336	11,329	26,456	10.50	2,520
2015	15,582.28	3,636	3,633	11,949	11.50	1,039
2016	9,722.97	1,621	1,620	8,103	12.50	648
2018	6,023.03	201	201	5,822	14.50	402
	483,974.70	319,705	319,500	164,475		32,284
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 5.1 6.67						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 392.00 TRANSPORTATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 8-L3						
NET SALVAGE PERCENT.. +10						
2004	10,356.81	8,839	7,789	1,532	0.79	1,532
2005	17,735.21	14,848	13,084	2,878	1.01	2,850
2008	7,815.35	6,063	5,343	1,691	1.68	1,007
2009	45,264.40	34,098	30,046	10,692	1.85	5,779
2010	218,467.48	159,617	140,650	55,971	1.97	28,412
2012	24,338.16	16,218	14,291	7,613	2.28	3,339
2018	3,497.91	223	196	2,952	6.55	451
	327,475.32	239,906	211,399	83,329		43,370
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 1.9 13.24						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 393.00 STORES EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 25-SQUARE						
NET SALVAGE PERCENT.. 0						
1994	639.18	626	617	22	0.50	22
1998	668.95	549	540	129	4.50	29
2018	13,960.02	279	275	13,685	24.50	559
	15,268.15	1,454	1,432	13,836		610
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 22.7 4.00						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 394.00 TOOLS, SHOP AND GARAGE EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 20-SQUARE						
NET SALVAGE PERCENT.. 0						
2003	6,453.69	5,002	5,004	1,450	4.50	322
2004	152,084.45	110,261	110,297	41,787	5.50	7,598
2005	106,619.24	71,968	71,991	34,628	6.50	5,327
2006	95,031.80	59,395	59,414	35,618	7.50	4,749
2007	296,114.39	170,266	170,321	125,793	8.50	14,799
2008	297,839.63	156,366	156,416	141,424	9.50	14,887
2009	217,265.46	103,201	103,234	114,031	10.50	10,860
2010	193,076.03	82,057	82,084	110,992	11.50	9,651
2011	358,163.23	134,311	134,354	223,809	12.50	17,905
2012	456,262.56	148,285	148,333	307,930	13.50	22,810
2013	220,987.98	60,772	60,792	160,196	14.50	11,048
2014	377,182.70	84,866	84,893	292,290	15.50	18,857
2015	341,092.69	59,691	59,710	281,383	16.50	17,054
2016	128,653.82	16,082	16,087	112,567	17.50	6,432
2017	332,535.91	24,940	24,948	307,588	18.50	16,626
2018	312,767.02	7,819	7,822	304,945	19.50	15,638
	3,892,130.60	1,295,282	1,295,700	2,596,431		194,563
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT ..						13.3 5.00

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 395.00 LABORATORY EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 15-SQUARE						
NET SALVAGE PERCENT.. 0						
2007	12,933.38	9,916	9,913	3,020	3.50	863
	12,933.38	9,916	9,913	3,020		863
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.5 6.67						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 396.00 POWER OPERATED EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. IOWA 9-S0.5						
NET SALVAGE PERCENT.. +5						
1998	5,777.95	5,489	5,489			
2000	4,769.14	4,531	4,531			
2009	12,813.41	9,483	10,446	1,727	2.70	640
2013	5,425.68	2,968	3,269	1,885	4.05	465
	28,786.18	22,471	23,735	3,612		1,105
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.3 3.84						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 397.00 COMMUNICATION EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 15-SQUARE						
NET SALVAGE PERCENT.. 0						
2008	251,407.35	175,985	175,982	75,425	4.50	16,761
2009	35,205.75	22,297	22,297	12,909	5.50	2,347
2010	40,062.62	22,702	22,701	17,362	6.50	2,671
2011	88,168.25	44,084	44,083	44,085	7.50	5,878
2012	3,711.65	1,608	1,608	2,104	8.50	248
2013	9,595.07	3,518	3,518	6,077	9.50	640
2014	108,777.10	32,633	32,632	76,145	10.50	7,252
2015	54,951.42	12,822	12,822	42,129	11.50	3,663
2016	37,456.21	6,243	6,243	31,213	12.50	2,497
2017	16,062.90	1,606	1,606	14,457	13.50	1,071
2018	25,235.78	841	841	24,395	14.50	1,682
	670,634.10	324,339	324,333	346,301		44,710
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 7.7 6.67						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 397.02 FIXED RADIOS

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 15-SQUARE						
NET SALVAGE PERCENT.. 0						
2009	6,064.82	3,841	3,835	2,230	5.50	405
2013	243,942.30	89,446	89,317	154,625	9.50	16,276
	250,007.12	93,287	93,152	156,855		16,681
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 9.4 6.67						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 398.00 MISCELLANEOUS EQUIPMENT

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 15-SQUARE						
NET SALVAGE PERCENT.. 0						
2007	1,193.31	915	915	278	3.50	79
2009	8,050.85	5,099	5,097	2,954	5.50	537
2010	5,556.82	3,149	3,148	2,409	6.50	371
2011	80,265.60	40,133	40,121	40,145	7.50	5,353
2012	13,292.37	5,760	5,758	7,534	8.50	886
2013	47,454.88	17,400	17,395	30,060	9.50	3,164
2015	17,040.87	3,976	3,975	13,066	11.50	1,136
2016	12,811.34	2,135	2,134	10,677	12.50	854
2017	95,411.55	9,541	9,538	85,874	13.50	6,361
	281,077.59	88,108	88,081	192,997		18,741
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 10.3 6.67						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 399.01 SERVERS HARDWARE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR	ORIGINAL COST (1)	CALCULATED ACCRUED (2)	ALLOC. RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 7-SQUARE						
NET SALVAGE PERCENT.. 0						
2012	13,468.75	12,507	11,761	1,708	0.50	1,708
2013	3,144.65	2,471	2,324	821	1.50	547
2016	20,730.96	7,404	6,962	13,769	4.50	3,060
2017	10,154.68	2,176	2,046	8,109	5.50	1,474
	47,499.04	24,558	23,093	24,406		6,789
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.6 14.29						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 399.02 SERVERS SOFTWARE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 7-SQUARE						
NET SALVAGE PERCENT.. 0						
2017	15,235.37	3,265	3,261	11,974	5.50	2,177
	15,235.37	3,265	3,261	11,974		2,177
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 5.5 14.29						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 399.03 NETWORK HARDWARE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRAULS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 7-SQUARE						
NET SALVAGE PERCENT.. 0						
2012	65,342.09	60,675	58,161	7,181	0.50	7,181
2013	7,872.58	6,186	5,930	1,943	1.50	1,295
2014	70,907.82	45,584	43,696	27,212	2.50	10,885
2015	134,319.51	67,160	64,377	69,943	3.50	19,984
2016	107,224.74	38,294	36,708	70,517	4.50	15,670
2017	64,164.63	13,750	13,180	50,985	5.50	9,270
	449,831.37	231,649	222,052	227,779		64,285
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 3.5 14.29						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 399.06 PC HARDWARE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
FULLY ACCRUED						
NET SALVAGE PERCENT.. 0						
2012	80,171.99	80,172	80,172			
2013	175,845.01	175,845	175,845			
	256,017.00	256,017	256,017			
AMORTIZED						
SURVIVOR CURVE.. 5-SQUARE						
NET SALVAGE PERCENT.. 0						
2014	165,742.03	149,168	141,361	24,381	0.50	24,381
2015	272,575.43	190,803	180,817	91,758	1.50	61,172
2016	138,114.91	69,057	65,443	72,672	2.50	29,069
2017	152,054.67	45,616	43,229	108,826	3.50	31,093
	728,487.04	454,644	430,850	297,637		145,715
	984,504.04	710,661	686,867	297,637		145,715
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 2.0						14.80

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 399.07 PC SOFTWARE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
FULLY ACCRUED						
NET SALVAGE PERCENT.. 0						
2012	14,249.25	14,249	14,249			
	14,249.25	14,249	14,249			
AMORTIZED						
SURVIVOR CURVE.. 5-SQUARE						
NET SALVAGE PERCENT.. 0						
2014	18,571.95	16,715	15,334	3,238	0.50	3,238
2015	7,984.67	5,589	5,127	2,857	1.50	1,905
2016	4,384.13	2,192	2,011	2,373	2.50	949
2017	9,032.24	2,710	2,486	6,546	3.50	1,870
2018	17,103.54	1,710	1,569	15,535	4.50	3,452
	57,076.53	28,916	26,527	30,550		11,414
	71,325.78	43,165	40,776	30,550		11,414
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 2.7 16.00						

ATMOS ENERGY CORPORATION
KANSAS DIVISION

ACCOUNT 399.08 APPLICATION SOFTWARE

CALCULATED REMAINING LIFE DEPRECIATION ACCRUAL
RELATED TO ORIGINAL COST AS OF SEPTEMBER 30, 2018

YEAR (1)	ORIGINAL COST (2)	CALCULATED ACCRUED (3)	ALLOC. BOOK RESERVE (4)	FUTURE BOOK ACCRUALS (5)	REM. LIFE (6)	ANNUAL ACCRUAL (7)
SURVIVOR CURVE.. 7-SQUARE						
NET SALVAGE PERCENT.. 0						
2012	736,829.93	684,198	631,513	105,317	0.50	105,317
	736,829.93	684,198	631,513	105,317		105,317
COMPOSITE REMAINING LIFE AND ANNUAL ACCRUAL RATE, PERCENT .. 1.0 14.29						

NED W. ALLIS

DEPRECIATION EXPERIENCE

Q. Please state your name.

A. My name is Ned W. Allis.

Q. What is your educational background?

A. I have a Bachelor of Science degree in Mathematics from Lafayette College in Easton, PA.

Q. Do you belong to any professional societies?

A. Yes. I am a member and past President of the Society of Depreciation Professionals (“Society”) and an associate member of the American Gas Association/Edison Electric Institute Industry Accounting Committee. I also serve on the faculty for training offered by the Society and am an instructor for the Society’s “Introduction to Depreciation,” “Life and Net Salvage Analysis,” “Analyzing the Life of Real-World Property,” “Analyzing Net Salvage in the Real World” and “Depreciation and Ratemaking Issues” courses.

Q. Do you hold any special certification as a depreciation expert?

A. Yes. The Society of Depreciation Professionals has established national standards for depreciation professionals. The Society administers an examination to become certified in this field. I passed the certification exam in September 2011 and was recertified in March 2017.

Q. Please outline your experience in the field of depreciation.

A. I joined Gannett Fleming in October 2006 as an analyst. My responsibilities included assembling data required for depreciation studies, conducting statistical analyses of service life and net salvage data, calculating annual and accrued depreciation, and assisting in preparing reports and testimony setting forth and defending the results of the studies. I

also developed and maintained Gannett Fleming's proprietary depreciation software. In March 2013, I was promoted to the position of Supervisor of Depreciation Studies. In March 2017, I was promoted to Project Manager, Depreciation and Technical Development. In January 2019, I was promoted to my current position of Vice President. In my current position, I am responsible for conducting depreciation, valuation and original cost studies, determining service life and salvage estimates, conducting field reviews, presenting recommended depreciation rates to clients, and supporting such rates before state and federal regulatory agencies. I am also responsible for Gannett Fleming's proprietary depreciation software, training of depreciation staff, and the development of solutions for technical issues related to depreciation. Since joining Gannett Fleming, I have worked on more than one hundred depreciation assignments.

Q. Have you submitted testimony to any state utility commission on the subject of utility plant depreciation?

- A. Yes. I have submitted testimony on depreciation related topics to the Connecticut Public Utilities Regulatory Authority, the New York Department of Public Service, the New Jersey Board of Public Utilities, the Nevada Public Utilities Commission, the Florida Public Service Commission, the District of Columbia Public Service Commission, the California Public Utilities Commission, the Rhode Island Public Utilities Commission, the Massachusetts Department of Public Utilities and the Maryland Public Service Commission. I have also testified before the Federal Energy Regulatory Commission (“FERC”).

Q. Have you had any additional education relating to utility plant depreciation?

A. Yes. I have completed the following courses conducted by the Society: "Depreciation Basics," "Life and Net Salvage Analysis" and "Preparing and Defending a Depreciation Study."

Q. Does this conclude your qualification statement?

A. Yes.

LIST OF CASES IN WHICH NED W. ALLIS SUBMITTED TESTIMONY

<u>Year</u>	<u>Jurisdiction</u>	<u>Docket No.</u>	<u>Client/Utility</u>	<u>Subject</u>
01. 2013	NV	13-06004	Sierra Pacific Power Company	Depreciation
02. 2013	NY	13-E-0030, 13-G-0031 & 13-S-0032	Consolidated Edison Company of New York	Depreciation
03. 2013	DC	Case No. 1103	Pepco	Depreciation
04. 2014	NY	14-G-0494	Orange and Rockland - Gas	Depreciation
05. 2014	NY	14-E-0493	Orange and Rockland - Electric	Depreciation
06. 2014	NY	15-E-0050	Consolidated Edison Company of New York - Electric	Depreciation
07. 2015	FERC	ER15-2294-000	Pacific Gas & Electric Company TO17	Depreciation
08. 2015	NY	16-E-0060	Consolidated Edison Company of New York - Electric	Depreciation
09. 2015	NY	16-G-0061	Consolidated Edison Company of New York - Gas	Depreciation
10. 2016	FL	160021-EI	Florida Power & Light Company	Depreciation
11. 2016	NV	16-06008	Sierra Pacific Power Company - Electric	Depreciation
12. 2016	NV	16-06009	Sierra Pacific Power Company - Gas	Depreciation
13. 2016	NJ	ER 16050428	Rockland Electric Company	Depreciation
14. 2016	FERC	ER16-2320-000	Pacific Gas & Electric Company – Electric Transmission	Depreciation
15. 2016	DC	Case No. 1139	Pepco	Depreciation
16. 2017	NV	17-06004	Nevada Power Company	Depreciation
17. 2017	FERC	ER17-2154-000	Pacific Gas & Electric Company – Electric Transmission	Depreciation
18. 2017	CT	17-10-46	Connecticut Light & Power	Depreciation
19. 2017	CA	A.17-11-009	Pacific Gas & Electric – Gas Transmission and Storage	Depreciation
20. 2017	RI	4770	Narragansett Electric Company	Depreciation
21. 2017	DC	Case No. 1150	Pepco	Depreciation
22. 2018	CT	18-05-10	Yankee Gas Services Company	Depreciation
23. 2018	NY	18-E-0067	Orange and Rockland – Electric	Depreciation
24. 2018	NY	18-G-0068	Orange and Rockland – Gas	Depreciation
25. 2018	NJ	ER18080925	Atlantic City Electric Company	Depreciation
26. 2018	FERC	ER19-13-000	Pacific Gas & Electric Company – Electric Transmission	Depreciation
27. 2018	FERC	ER19-284-000	Florida Power & Light Company	Depreciation
28. 2018	CA	A. 18-12-009	Pacific Gas & Electric Company	Depreciation
29. 2018	NY	19-E-0065	Consolidated Edison Company of New York - Electric	Depreciation

	<u>Year</u>	<u>Jurisdiction</u>	<u>Docket No.</u>	<u>Client/Utility</u>	<u>Subject</u>
30.	2018	NY	19-G-0065	Consolidated Edison Company of New York - Gas	Depreciation
31.	2019	MA	18-150	Massachusetts Electric Company	PBR /
32.	2019	MD	9610	Baltimore Gas & Electric Company	Depreciation Depreciation