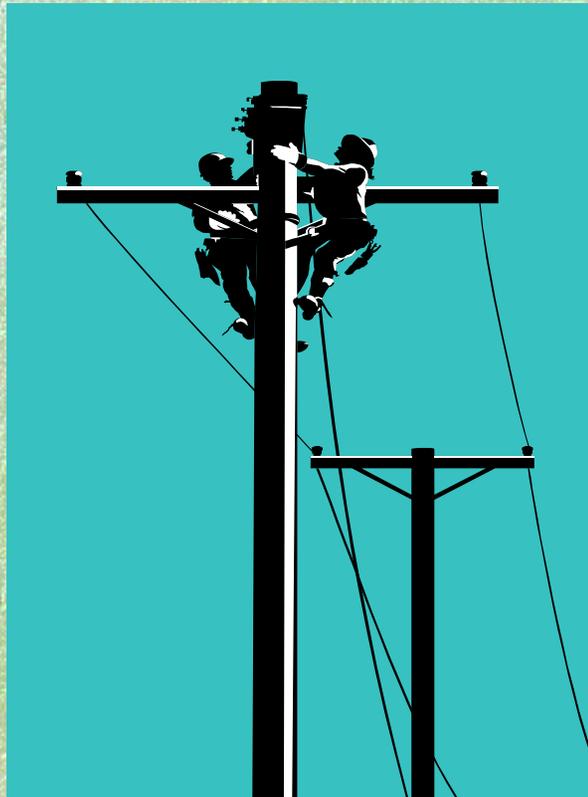


# **ARIZONA CORPORATION COMMISSION**

## **METERING ISSUES WORKSHOP**



**ARIZONA CORPORATION COMMISSION  
HEARING ROOMS 1 AND 2**

**JULY 1, 1999**



## **METERING ISSUES WORKSHOP**

### **AGENDA**

- **INTRODUCTION ON FORMATION OF METERING COMMITTEE**
- **SUMMARY OF MEETING DATES AND 11/3/97 REPORT**
- **DISCUSSION OF METERING RULES IN R14-2-1612(K) 1-15**
- **DISCUSSION OF THE METERING RULES THAT MUST BE APPROVED BY THE DIRECTOR, UTILITIES DIVISION**
- **STATUS OF CC&NS FOR MSPS AND MRSPS**
- **QUESTIONS AND ANSWERS**

# **UNBUNDLED SERVICES AND STANDARD OFFER WORKING GROUP**

## **WAS CREATED BY RULE R14-2-1606(I) WHICH WAS APPROVED ON DECEMBER 26, 1996**

**WITHIN 90 DAYS OF THE ADOPTION OF THIS ARTICLE, THE COMMISSION STAFF SHALL COMMENCE A SERIES OF WORKSHOPS TO EXPLORE ISSUES IN THE PROVISION OF UNBUNDLED SERVICE AND STANDARD OFFER SERVICE.**

- 1. PARTIES TO BE INVITED TO PARTICIPATE IN THE WORKSHOPS SHALL INCLUDE UTILITIES, CONSUMERS, ORGANIZATIONS PROMOTING ENERGY EFFICIENCY, AND OTHER ELECTRIC SERVICE PROVIDERS.**
- 2. AMONG THE ISSUES TO BE REVIEWED IN THE WORKSHOPS ARE: METERING REQUIREMENTS; METERING PROTOCOLS; DESIGNATION OF APPROPRIATE TEST YEARS; THE NATURE OF ADJUSTMENTS TO TEST YEAR DATA; DE-AVERAGING OF RATES; SERVICE CHARACTERISTICS SUCH AS VOLTAGE LEVELS; REVENUE UNCERTAINTY; LINE EXTENSION POLICIES; AND THE NEED FOR PERFORMANCE BONDS.**
- 3. A REPORT SHALL BE SUBMITTED TO THE COMMISSION BY THE STAFF ON THE ACTIVITIES AND RECOMMENDATIONS OF THE PARTICIPANTS IN THE WORKSHOPS NOT LATER THAN 60 DAYS PRIOR TO THE DATE INDICATED IN R14-2-1602. THE COMMISSION SHALL CONSIDER ANY RECOMMENDATIONS REGARDING UNBUNDLED SERVICE AND STANDARD OFFER SERVICE TARIFFS.**

# **UNBUNDLED SERVICES AND STANDARD OFFER WORKING GROUP METERING SUBCOMMITTEE**

## **SCOPE**

- **All issues relative to metering and meter reading which are required to be resolved in order to implement the Commission's Rules on Electric Competition.**

## **OBJECTIVES**

- **To identify, discuss, and resolve metering and meter reading issues for the purpose of making recommendations to the Commission for incorporation in appropriate rule making.**

**UNBUNDLED SERVICES AND  
STANDARD OFFER WORKING GROUP  
METERING SUBCOMMITTEE**

**MEETING DATES**

<b>5/28/97</b>	<b>1/21/98</b>	<b>6/2/99</b>
<b>7/1/97</b>	<b>2/24/98</b>	<b>6/18/99</b>
<b>7/30/97</b>	<b>3/20/98</b>	
<b>8/21/97</b>	<b>4/22/98</b>	
<b>9/11/97</b>	<b>5/18/98</b>	
<b>9/26/97</b>	<b>6/8/98</b>	
	<b>6/29/98</b>	

**REPORT TO THE  
ARIZONA CORPORATION COMMISSION**

**IN THE MATTER OF THE COMPETITION  
IN THE PROVISION OF ELECTRIC SERVICE  
THROUGHOUT THE STATE OF ARIZONA**

**DOCKET NO. E-00000-94-0165**

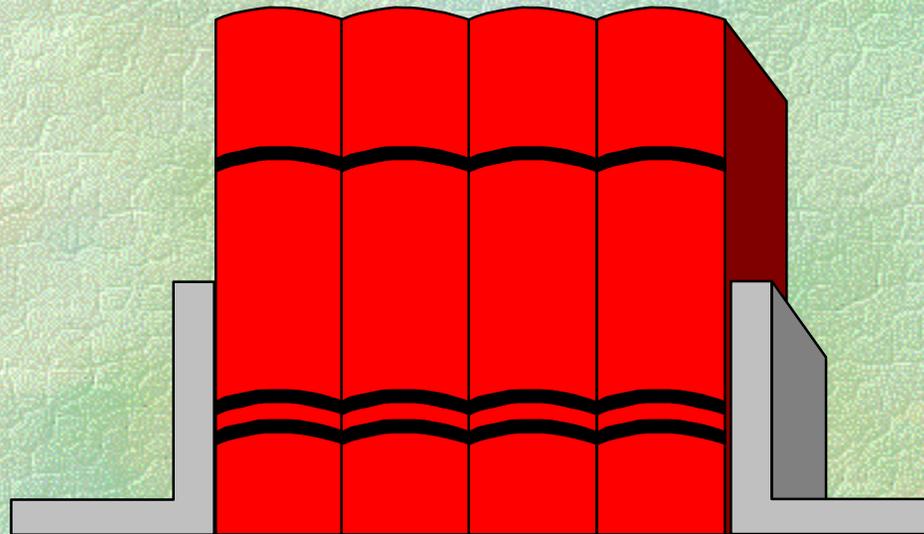
**SUBMITTED BY**

**THE UNBUNDLED SERVICES AND  
STANDARD OFFER WORKING GROUP**

**NOVEMBER 3, 1997**

# ELECTRIC COMPETITION METERING RULES

## R14-2-1612(K) ADDITIONAL PROVISIONS FOR METERING AND METER READING SERVICES



**R14-2-1612. SERVICE QUALITY, CONSUMER PROTECTION,  
SAFETY, AND BILLING REQUIREMENTS**

**K. ADDITIONAL PROVISIONS FOR METERING AND METER  
READING SERVICES**

- 1. AN ELECTRIC SERVICE PROVIDER WHO PROVIDES METERING OR METER READING SERVICES PERTAINING TO A PARTICULAR CONSUMER SHALL PROVIDE ACCESS USING ELECTRONIC DATA INTERCHANGE (EDI) FORMATS TO METER READING DATA TO OTHER ELECTRIC SERVICE PROVIDERS SERVING THAT SAME CONSUMER WHEN AUTHORIZED BY THE CONSUMER.**
- 2. ANY PERSON OR ENTITY RELYING ON METERING INFORMATION PROVIDED BY ANOTHER ELECTRIC SERVICE PROVIDER MAY REQUEST A METER TEST ACCORDING TO THE TARIFF ON FILE AND APPROVED BY THE COMMISSION. HOWEVER, IF THE METER IS FOUND TO BE IN ERROR BY MORE THAN 3%, NO METER TESTING FEE WILL BE CHARGED.**
- 3. EACH COMPETITIVE CUSTOMER SHALL BE ASSIGNED A UNIVERSAL NODE IDENTIFIER FOR EACH SERVICE DELIVERY POINT BY THE AFFECTED UTILITY OR THE UTILITY DISTRIBUTION COMPANY WHOSE DISTRIBUTION SYSTEM SERVES THE CUSTOMER.**

## **K. ADDITIONAL PROVISIONS FOR METERING AND METER READING SERVICES**

- 4. UNLESS THE COMMISSION GRANTS A SPECIFIC WAIVER, ALL COMPETITIVE METERED AND BILLING DATA SHALL BE TRANSLATED INTO CONSISTENT, STATEWIDE EDI FORMATS BASED ON STANDARDS APPROVED BY THE UTILITY INDUSTRY GROUP (UIG) THAT CAN BE USED BY THE AFFECTED UTILITY OR THE UTILITY DISTRIBUTION COMPANY AND THE ELECTRIC SERVICE PROVIDER.**
- 5. UNLESS THE COMMISSION GRANTS A SPECIFIC WAIVER, AN EDI FORMAT SHALL BE USED FOR ALL DATA EXCHANGE TRANSACTIONS FROM THE METER READING SERVICE PROVIDER TO THE ELECTRIC SERVICE PROVIDER, UTILITY DISTRIBUTION COMPANY, AND SCHEDULE COORDINATOR. THIS DATA WILL BE TRANSFERRED VIA THE INTERNET USING A SECURE SOCKETS LAYER OR OTHER SECURE ELECTRONIC MEDIA.**
- 6. MINIMUM METERING REQUIREMENTS FOR COMPETITIVE CUSTOMERS OVER 20 KW, OR 100,000 KWH ANNUALLY, SHOULD CONSIST OF HOURLY CONSUMPTION MEASUREMENT METERS OR METER SYSTEMS. PREDICTABLE LOADS WILL BE PERMITTED TO USE LOAD PROFILES TO SATISFY THE REQUIREMENTS FOR HOURLY CONSUMPTION DATA. THE AFFECTED UTILITY OR ELECTRIC SERVICE PROVIDER WILL MAKE THE DETERMINATION IF A LOAD IS PREDICTABLE.**

## **K. ADDITIONAL PROVISIONS FOR METERING AND METER READING SERVICES**

- 7. COMPETITIVE CUSTOMERS WITH HOURLY LOADS OF 20 KW (OR 100,000 KWH ANNUALLY) OR LESS, WILL BE PERMITTED TO USE LOAD PROFILING TO SATISFY THE REQUIREMENTS FOR HOURLY CONSUMPTION DATA, HOWEVER, THEY MAY CHOOSE OTHER METERING OPTIONS OFFERED BY THEIR ELECTRIC SERVICE PROVIDER CONSISTENT WITH THE COMMISSION RULES ON METERING.**
- 8. METERING EQUIPMENT OWNERSHIP WILL BE LIMITED TO THE AFFECTED UTILITY, UTILITY DISTRIBUTION COMPANY, AND THE ELECTRIC SERVICE PROVIDER OR THEIR REPRESENTATIVE, OR THE CUSTOMER, WHO MUST OBTAIN THE METERING EQUIPMENT THROUGH THE AFFECTED UTILITY, UTILITY DISTRIBUTION COMPANY OR AN ELECTRIC SERVICE PROVIDER.**
- 9. MAINTENANCE AND SERVICING OF THE METERING EQUIPMENT WILL BE LIMITED TO THE AFFECTED UTILITY, UTILITY DISTRIBUTION COMPANY AND THE ELECTRIC SERVICE PROVIDER OR THEIR REPRESENTATIVE.**
- 10. DISTRIBUTION PRIMARY VOLTAGE CURRENT TRANSFORMERS AND POTENTIAL TRANSFORMERS MAY BE OWNED ONLY BY THE AFFECTED UTILITY, UTILITY DISTRIBUTION COMPANY OR THE ELECTRIC SERVICE PROVIDER OR THEIR REPRESENTATIVE.**

## **K. ADDITIONAL PROVISIONS FOR METERING AND METER READING SERVICES**

- 11. TRANSMISSION PRIMARY VOLTAGE CURRENT TRANSFORMERS AND POTENTIAL TRANSFORMERS MAY BE OWNED BY THE AFFECTED UTILITY OR UTILITY DISTRIBUTION COMPANY ONLY.**
- 12. NORTH AMERICAN ELECTRIC RELIABILITY COUNCIL RECOGNIZED HOLIDAYS WILL BE USED IN CALCULATING WORKING DAYS FOR METER DATA TIMELINESS REQUIREMENTS.**
- 13. BY MAY 1, 1999, THE DIRECTOR, UTILITIES DIVISION, SHALL APPROVE OPERATING PROCEDURES TO BE USED BY THE UTILITY DISTRIBUTION COMPANIES AND THE METER SERVICE PROVIDERS FOR PERFORMING WORK ON PRIMARY METERED CUSTOMERS.**
- 14. BY MAY 1, 1999, THE DIRECTOR, UTILITIES DIVISION, SHALL APPROVE OPERATING PROCEDURES TO BE USED BY THE METER READING SERVICE PROVIDER FOR VALIDATING, EDITING, AND ESTIMATING METERING DATA.**
- 15. BY MAY 1, 1999, THE DIRECTOR, UTILITIES DIVISION, SHALL APPROVE PERFORMANCE METERING SPECIFICATIONS AND STANDARDS TO BE USED BY ALL ENTITIES PERFORMING METERING.**

**METERING RULES THAT MUST BE APPROVED BY THE  
DIRECTOR, UTILITIES DIVISION**



**RAY WILLIAMSON, ACTING DIRECTOR**

**R14-2-1612 (K) 13.**

**By May 1, 1999, the Director, Utilities Division, shall approve operating procedures to be used by the Utility Distribution Companies and the Meter Service Providers for performing work on primary metered customers.**

**Definition: PRIMARY METERING IS DEFINED AS METERING INSTALLED ON SERVICE VOLTAGES ABOVE 600 VOLTS.**

**A. MSPs CAN PERFORM PRIMARY METERING FROM 600 V TO 25 kV**

- 1. MSP MUST COMPLY WITH THE ARIZONA OVERHEAD POWER LINE SAFETY LAW (ARS 40-360.41,45) FOR PRIMARY WORK ONLY AND CAN ASK UDC FOR A WAIVER TO THIS LAW.**
- 2. ALL HOOKUPS TO THE PRIMARY SIDE SHALL BE DONE BY THE UDCs.**
- 3. THE UDC SHALL PERFORM ALL SWITCHING OPERATIONS ON THE PRIMARY SIDE**

**B. UDCs WILL PERFORM PRIMARY METERING ABOVE 25 kV**

- 1. UDC CAN CONTRACT WITH A THIRD PARTY TO PERFORM THIS WORK.**
- 2. IF MSPs ARE CONTRACTED BY THE UDCs, MSP MUST FOLLOW UDC S OPERATIONAL PROCEDURES.**
- 3. MSP SHOULD NOT PERFORM WORK ON INSTRUMENT TRANSFORMERS FOR VOLTAGES OVER 25 kV.**
- 4. THE UDC SHALL PERFORM ALL SWITCHING OPERATIONS ON THE PRIMARY SIDE.**

**C. TERMS AND CONDITIONS FOR MSPs DOING PRIMARY METERING WORK**

- 1. MUST BE PERFORMED BY A CLASS 3 METERMAN ONLY.**
- 2. MSP MUST CONFORM WITH ACC STANDARDS AND UDC GUIDELINES.**
- 3. MSP MUST COORDINATE ALL WORK DIRECTLY WITH UDC.**
- 4. UDC WILL DEVELOP AND ADMINISTER SWITCHING ORDERS**
- 5. UDC WILL PERFORM ALL SWITCHING ON THE PRIMARY SIDE.**

**D. OTHER CONDITIONS FOR MSPs DOING PRIMARY METERING WORK**

- 1. MSPs MUST FOLLOW AMERICAN PUBLIC POWER ASSOCIATION (APPA) SAFETY MANUAL.**
- 2. UDC MAY CHARGE MSP FOR PROVIDING ASSISTANCE FOR PRIMARY METERING SYSTEMS.**
- 3. FOR ANY DAMAGE TO OR MALFUNCTION OF MSP s PRIMARY METERING SYSTEM, UDC WILL ISOLATE EQUIPMENT FROM DISTRIBUTION SYSTEM BY CUTTING THE JUMPERS BETWEEN METERING EQUIPMENT AND THE DISTRIBUTION SYSTEM.**

**R14-2-1612 (K) 14.**

**By May 1, 1999, the Director, Utilities Division, shall approve operating procedures to be used by the Meter Reading Service Provider for Validating, Editing, and Estimating metering data.**

**1. REQUIRED DATA VALIDATION TESTS**

**A. THE FOLLOWING TESTS ARE REQUIRED FOR kWh AND kVARh (IF USED IN BILLING) INTERVAL DATA VALIDATION:**

**TIME CHECK OF METER READING DEVICE/SYSTEM**

**TIME CHECK OF METER**

**PULSE OVERFLOW CHECK**

**SUM CHECK**

**SPIKE CHECK (INTERVAL ONLY)**

**HIGH/LOW CHECK: THIS TEST MUST BE BASED ON AVAILABLE HISTORICAL DATA ADJUSTED FOR LOCAL USAGE PATTERNS. MRSP MUST PROVIDE THE UDC WITH THE ALGORITHM THEY INTEND TO USE FOR THIS CHECK.**

**TEST MODE CHECK**

**METER IDENTIFICATION CHECK**

**B. THE FOLLOWING TESTS ARE REQUIRED FOR MONTHLY CONSUMPTION DATA VALIDATION:**

**HIGH/LOW USAGE CHECK**

**HIGH/LOW DEMAND CHECK (APPLIES TO DEMAND READINGS ONLY)**

**TIME-OF-USE CHECK (APPLIES TO TOU DATA ONLY)**

**ZERO CONSUMPTION FOR ACTIVE METERS:**

**THIS TEST MUST BE BASED ON AVAILABLE HISTORICAL DATA ADJUSTED FOR LOCAL USAGE PATTERNS. MRSP MUST PROVIDE THE UDC WITH THE ALGORITHM THEY INTEND TO USE FOR THIS CHECK.**

**USAGE FOR INACTIVE METERS (THIS ONLY APPLIES TO MANUAL METER READING METHODS)**

**DIAL DECIMAL QUANTITY (THIS ONLY APPLIES TO DEMAND METERS USED FOR DEMAND RATE ACCOUNTS)**

**EXTERNAL METER IDENTIFICATION**

## **2. DATA ESTIMATION**

**DATA ESTIMATION IS REQUIRED WHEN AN ACTUAL READ IS NOT AVAILABLE.  
THE FOLLOWING DATA ESTIMATION RULES ARE REQUIRED:**

**ESTIMATION FOR MONTHLY DATA: USE HISTORICAL DATA FOR SAME CUSTOMER: USE CLASS PROFILE DATA IF HISTORICAL DATA FOR SAME CUSTOMER IS UNAVAILABLE**

**ESTIMATION FOR INTERVAL DATA WHEN LESS THAN 2 HOURS OF DATA IS MISSING: USE STRAIGHT-LINE INTERPOLATION**

**ESTIMATION FOR INTERVAL DATA WHEN MORE THAN 2 HOURS OF DATA IS MISSING: USE HISTORICAL DATA FOR THE SAME CUSTOMER; USE CLASS PROFILE DATA IF HISTORICAL DATA FOR THE SAME CUSTOMER IS UNAVAILABLE.**

## **3. EXCEPTION REPORTING**

**MRSP MUST SUBMIT A PLAN FOR REPORTING ABNORMAL METERING CONDITIONS CONSISTENT WITH CC&N REQUIREMENT.**

**R14-2-1612 (K) 15.**

**By May 1, 1999, the Director, Utilities Division, shall approve performance metering specifications and standards to be used by all entities performing metering.**

**1. METERING STANDARDS (WHERE APPLICABLE)**

**ANSI C12.1 CODE FOR ELECTRICITY METERING**

**ANSI C12.6 MARKETING & ARRANGEMENT OF TERMINALS  
FOR PHASE SHIFTING DEVICES USED IN METERING**

**ANSI C12.7 WATT-HOUR METER SOCKET**

**ANSI C12.10 ELECTROMECHANICAL WATT-HOUR METERS**

**ANSI C12.13 ELECTRONIC TOU REGISTERS FOR ELECTRICITY  
METERS**

**ANSI C12.18 TYPE 2 OPTICAL PORT**

**ANSI C12.20 0.2% & 0.5% ACCURACY CLASS METERS**

**ANSI C37.90 SURGE WITHSTAND TEST**

**ANSI 57.13 INSTRUMENT TRANSFORMERS**

**ANSI Z1.4 SAMPLING PROCEDURES AND TABLES FOR INSPECTION**

**ANSI Z1.9 SAMPLING PROCEDURES AND TABLES FOR INSPECTION**

**R14-2-1612 (K) 15.**

**By May 1, 1999, the Director, Utilities Division, shall approve performance metering specifications and standards to be used by all entities performing metering.**

- 2. EEI ELECTRICITY METERING HANDBOOK**
- 3. ELECTRIC UTILITIES SERVICE EQUIPMENT REQUIREMENTS COMMITTEE (EUSERC) STANDARDS THAT ARE UTILIZED BY UDC S**
- 4. NATIONAL ELECTRIC SAFETY CODE (NESC)**
- 5. NATIONAL ELECTRIC CODE (NEC) & LOCAL REQUIREMENTS**

## **ARIZONA UNIVERSAL NODE IDENTIFIER**

**A UNIVERSAL IDENTIFIER IS AN IMPORTANT ELEMENT OF A COMPETITIVE ELECTRIC MARKET. IT ENABLES ACCURATE TRACKING OF ENERGY TRANSACTIONS, MINIMIZES TRANSACTION COSTS, REDUCES SYSTEM DEVELOPMENT COSTS, AND ACHIEVES OTHER ESSENTIAL BENEFITS.**

**THE POINT OF DELIVERY (POD) IS THE LAST POINT OF THE UDC S DISTRIBUTION NETWORK TO WHICH ENERGY IS DELIVERED BY THE UDC.**

**THE POD IDENTIFIER (POD ID) IS A UNIQUE, PERMANENT NUMBER ASSIGNED TO EACH POD PARTICIPATING IN DIRECT ACCESS AND USED FOR DATA EXCHANGES AND SERVICE POINT TRACKING.**

- 1. UNIQUE**
- 2. PERMANENT**
- 3. USE --- REQUIRED BY R14-2-1612(K)3**
- 4. ASSIGNING ENTITY---THE UDCS**
- 5. ASSIGNMENT PROCESS --- A POD ID WILL BE ASSIGNED TO EACH POD AS THE DASR IS PROCESSED.**
- 6. BASE FORMAT--- THE POD ID WILL HAVE A MINIMUM OF 5 ALPHANUMERIC DIGITS, WHICH IS THE DOE GEOGRAPHIC IDENTIFIER, AFTER THIS ID, THE UDC MAY PLACE ANYTHING IN COLUMNS 6 THROUGH 34.**

## ARIZONA UNIVERSAL NODE IDENTIFIER

7. **GEOGRAPHIC CODE** --- A FIVE-DIGIT PREFIX CORRESPONDING TO THE DOE s DESIGNATOR FOR THE UTILITY DISTRIBUTION COMPANY AT THE TIME OF POD ID ASSIGNMENT.
8. **LISTS** --- THE UDCs SHOULD MAINTAIN **MASTER LISTS** OF ALL EXISTING POD ID NUMBERS ON THEIR DISTRIBUTION SYSTEMS AND PROVIDE TO ESPs A LIST OF POD ID NUMBERS FOR THAT ESP UPON THE ESP s REQUEST.
9. **LINKS** --- THE UDC S DATABASE OF POD IDS SHOULD CONTAIN FOR EACH POD ID, THE FOLLOWING INFORMATION:
  - 1 - THE POD ID NUMBER
  - 2 - THE UDC S IDENTITY
  - 3 - THE PHYSICAL LOCATION OF THE POD IN THE UDC S OWN FORMAT
  - 4 - THE IDENTITY OF THE ESP RESPONSIBLE FOR SERVING ENERGY, BILLING, AND OR METERING FOR THAT POD
10. **TRANSLATION** --- THE ABOVE-DEFINED POD ID CAN BE IMPLEMENTED BY THE UDCs VIA A TRANSLATION TABLE BETWEEN THEIR EXISTING NUMBERING SYSTEMS AND THE POD ID.

# **ARIZONA UNIVERSAL NODE IDENTIFIER**

## **DOE GEOGRAPHIC CODE NUMBERS**

<b>AJO</b>	<b>00176</b>
<b>AEPCO</b>	<b>00796</b>
<b>APS</b>	<b>00803</b>
<b>CITIZENS</b>	<b>03597</b>
<b>DVEC</b>	<b>05438</b>
<b>GCEC</b>	<b>07456</b>
<b>MEC</b>	<b>21538</b>
<b>MORENCI</b>	<b>12919</b>
<b>SRP</b>	<b>16572</b>
<b>SSVEC</b>	<b>18280</b>
<b>TEP</b>	<b>24211</b>
<b>TRICO</b>	<b>19189</b>

## **UNIVERSAL METER IDENTIFIER (UMI)**

**WHOEVER PURCHASES THE METER WILL ASSIGN THE UMI. THIS ID WAS PROPOSED BY AEP AND IS FULLY ANSI C12.10 COMPLIANT. THE UMI FORMAT IS AS FOLLOWS (17 CHARACTERS)**

**AABYYYYYYYYZZZZZ**

**WHERE**

**AA IS THE METER TEST CODE**

**B IS AN IDENTIFIER FOR THE METER MANUFACTURER**

**YYYYYYYYYY IS THE METER MANUFACTURER S SERIAL NUMBER**

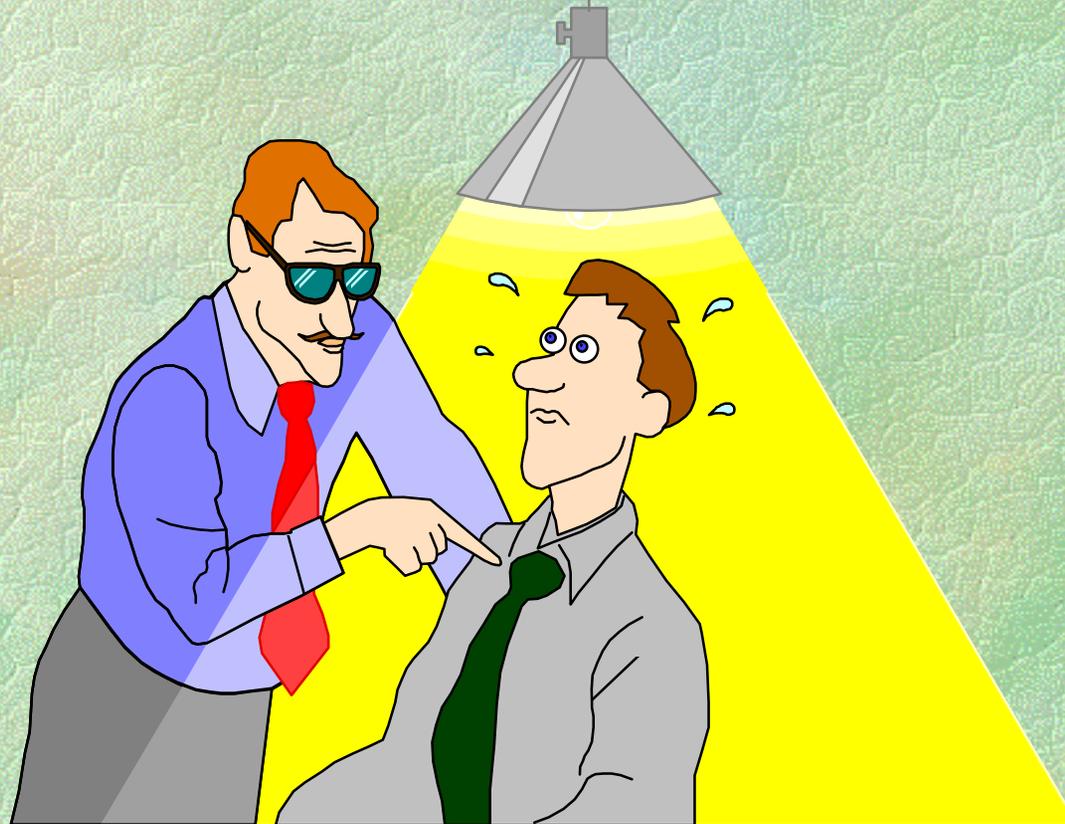
**ZZZZZ IS USER SPECIFIED**

**THE UMI WILL BE INCLUDED AS PART OF METERING SPECIFICATIONS IN R14-2-1612(K)15.**

**THE UMI IS NOT REQUIRED FOR STANDARD OFFER CUSTOMERS OR FOR THE LOAD PROFILED COMPETITIVE CUSTOMERS WHERE THE UDC IS THE MSP AND THE MRSP.**

**THIS ID IS NOT REQUIRED TO BE IMPLEMENTED UNTIL JANUARY 1, 2001; HOWEVER, THOSE SYSTEMS THAT HAVE ALREADY IMPLEMENTED THE UMI MAY BEGIN USING IT IMMEDIATELY.**

# STATUS OF MSP AND MRSP CC&N s



**UNBUNDLED SERVICES AND  
STANDARD OFFER WORKING GROUP  
METERING SUBCOMMITTEE**

**STATUS OF MSP CC&N s**

<b><u>MSP</u></b>	<b><u>HEARING DATE</u></b>	<b><u>STATUS</u></b>
<b>PHASER ADVANCED METERING SERVICES</b>	<b>FEB 24, 1999</b>	<b>CC&amp;N APPROVED ON 5/13/99</b>
<b>KWH METERING, L.L.C.</b>	<b>MARCH 25, 1999</b>	<b>CC&amp;N APPROVED ON 5/13/99</b>
<b>FIRST POINT SERVICES, INC.</b>	<b>MAY 20, 1999</b>	<b>CC&amp;N APPROVED ON 6/29/99</b>
<b>SCHLUMBERGER RESOURCES MANAGEMENT SERVICES, INC.</b>	<b>JUNE 24, 1999</b>	<b>WAITING FOR ORDER</b>

**UNBUNDLED SERVICES AND  
STANDARD OFFER WORKING GROUP  
METERING SUBCOMMITTEE**

**STATUS OF MRSP CC&N s**

<b><u>MRSP</u></b>	<b><u>HEARING DATE</u></b>	<b><u>STATUS</u></b>
<b>STAR DATA SERVICES, L.L.C.</b>	<b>APRIL 7, 1999</b>	<b>CC&amp;N APPROVED ON 6/29/99</b>
<b>FIRST POINT SERVICES, INC.</b>	<b>MAY 20, 1999</b>	<b>CC&amp;N APPROVED ON 6/29/99</b>
<b>SCHLUMBERGER RESOURCES MANAGEMENT SERVICES, INC.</b>	<b>JUNE 24, 1999</b>	<b>WAITING FOR ORDER</b>
<b>CELLNET</b>	<b>( HAS NOT FILED YET)</b>	<b>WAITING FOR FILING</b>

# QUESTIONS AND ANSWERS

