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BEFORE

THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

In re: F-00160324 Daniel J. Perwin v. Philadelphia Electric Company Requests a more affordable payment arrangement. Initial hearing.

Philadelphia, Pennsylvania
May 10, 1993

Pages 1 to 76, inclusive

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BEFORE

THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

In re: E-00160324 Daniel J. Ferwin v. Philadelphia Electric Company Requests a more affordable payment arrangement. Initial hearing.

Stenographic Report of hearing
held in Hearing Room 2,
Philadelphia, Pennsylvania

Monday,
May 10, 1993
at 10:00 o'clock a.m.

BEFORE

KY VAN NGUYEN, ADMINISTRATIVE LAW JUDGE

APPEARANCES:

DANIEL J. FERWIN
122 Dewey Road
Cheltenham, Pennsylvania 19012
Appearing Pro Se

MARY MCFALL HOPPER, ESQUIRE
2301 Market Street
Philadelphia, Pennsylvania 19101
Appearing on behalf of PECO

1

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2 JUDGE NGUYEN: We open the record for a hearing on
3 the complaint of Daniel J. Kerwin against Philadelphia
4 Electric Company at Docket Number F-00160324. My name is Ky
5 Van Nguyen. I am the Administrative Law Judge assigned by
6 the Commission to hear this complaint. I will ask the
7 parties to identify themselves for the record, Mr. Kerwin?

8 MR. KERWIN: Yes, sir.

9 JUDGE NGUYEN: Can you identify yourself for the
10 record please.

11 MR. KERWIN: Pennsylvania driver's license?

12 JUDGE NGUYEN: Your name and address?

13 MR. KERWIN: Oh, Daniel J. Kerwin.

14 JUDGE NGUYEN: And where do you reside?

15 MR. KERWIN: 122 Dewey Road, Cheltenham, Pennsylvania
16 19012.

17 JUDGE NGUYEN: Thank you.

18 JUDGE NGUYEN: Ms. Hopper?

19 MS. HOPPER: Yes, my name is Mary McFall Hopper and
20 I'm the attorney for Philadelphia Electric Company.

21 JUDGE NGUYEN: Mr. Kerwin, do you want to testify in
22 this hearing?

23 MR. KERWIN: Yes, sir.

24 JUDGE NGUYEN: Take this seat please.

25 DANIEL J. KERWIN, called as a witness, having been

1 duly sworn, was examined and testified as follows:

2 JUDGE NGUYEN: Tell me what happened.

3 DIRECT TESTIMONY

4 THE WITNESS: Well, my electric bill doubled after
5 they changed the meter.

6 JUDGE NGUYEN: When did they change the meter?

7 THE WITNESS: It will be two years ago this month
8 May.

9 JUDGE NGUYEN: And tell me the increase in
10 consumption each month.

11 THE WITNESS: Well, the -- according to them, my
12 consumption doubled but we didn't do anything. We didn't
13 add any appliances. There's only my wife and I living
14 there. There's no stereos being played nothing gets on all
15 day from 9 in the morning until I come home at 5:30 at
16 night. We have been there 14 years and for 12 years the
17 bill certainly wasn't cheap but to double it is -- and I
18 asked them why if they would come in -- they've had meters
19 on the place for three weeks removed them all last week. I
20 still haven't heard anything from them. They were supposed
21 to give me printouts.

22 JUDGE NGUYEN: In what month was your consumption 446
23 kilowatt hours? In what month was that?

24 THE WITNESS: What year, sir? This is a --

25 JUDGE NGUYEN: In your complaint?

1 THE WITNESS: The -- my electric bill average bill of
2 446 well, that was average.

3 JUDGE NGUYEN: In what year?

4 THE WITNESS: 1981.

5 JUDGE NGUYEN: 1981?

6 THE WITNESS: 1980, 1981, yes, they stayed about the
7 same.

8 JUDGE NGUYEN: When did it go up to 883 kilowatt
9 hours?

10 THE WITNESS: For the average of 1992.

11 JUDGE NGUYEN: 1992?

12 THE WITNESS: Well, that would be from May of '91 up
13 until April of '92 that would be that year. That was the
14 year it doubled to 883 kilowatts.

15 JUDGE NGUYEN: '92?

16 THE WITNESS: Yes.

17 JUDGE NGUYEN: When was the electric meter changed?

18 THE WITNESS: Well, there have been two meter
19 changes. They changed the first one in 1991.

20 JUDGE NGUYEN: What month was that?

21 THE WITNESS: May of '91.

22 JUDGE NGUYEN: May of '91?

23 THE WITNESS: Yes, it was the first meter change.

24 JUDGE NGUYEN: The second change?

25 THE WITNESS: Was May of '92.

1 JUDGE NGUYEN: Why did they change the -- they made
2 the change in May of 1991? Why did they do that?

3 THE WITNESS: They didn't tell us they just came out
4 and changed it. We saw the bills going up and they said it
5 was just your turn but they didn't change no other meters in
6 the area.

7 JUDGE NGUYEN: And why did they change in May of
8 1992?

9 THE WITNESS: They never explained that.

10 JUDGE NGUYEN: So after that your consumption
11 increased?

12 THE WITNESS: Sure it has stayed double what it has
13 been all through the '80's and the first year of 1990, '91
14 it doubled and this month's bill I got a bill this month for
15 \$95 for electricity. And we've cut back since this has been
16 going on.

17 JUDGE NGUYEN: You have to tell the Court what month
18 the consumption was increased -- was doubled. You just
19 cannot talk generally.

20 THE WITNESS: Okay. The first month we were aware of
21 it was May of 1991. Our kilowatt earned went from -- we
22 were at 330 in 1989, 301 in 1990, in '91 we went to 686. In
23 '92, we went to 807 that's almost triple.

24 JUDGE NGUYEN: When did it increase to 10,601
25 kilowatt hours?

1 THE WITNESS: For the year of '91, yes, sir. It
2 from May-June of '91 to April-May of '92 it jumped the same
3 period in '90 to '91 it was 5,000. Sir, I think if you turn
4 one more page you'll have this thing I'm looking at. Okay.
5 From '90 to '91 my kilowatts were 5,351. The following year
6 from '91 to '92 they jumped to 10,601. Now, I'd have to
7 stay up all night all Saturday and all Sunday and run
8 everything in the house to double my electricity. And...
9 wasn't that the bills were cheap.

10 JUDGE NGUYEN: How many members are there in your
11 family?

12 THE WITNESS: Just my wife and myself.

13 JUDGE NGUYEN: How many rooms are there in your
14 house?

15 THE WITNESS: Well, there's four bedrooms and three
16 rooms downstairs.

17 JUDGE NGUYEN: What kind of electric appliances do
18 you use in your house?

19 THE WITNESS: We have --

20 JUDGE NGUYEN: Radio?

21 THE WITNESS: Oh, yeah, sure. Well, I have one radio
22 that we play in the morning that plays for about an hour
23 when I'm getting up and getting out. We have a TV and a
24 VCR. We have a dishwasher, we have --

25 JUDGE NGUYEN: A dryer?

1 THE WITNESS: An electric dryer which they metered
2 this month. We have a washing machine and during of course
3 the summer months we have an air conditioner.

4 JUDGE NGUYEN: During the summer months only?

5 THE WITNESS: Yes, sir.

6 JUDGE NGUYEN: Before your consumption was increased,
7 what was the consumption previously?

8 THE WITNESS: Well, it averaged around 5300 to 5000 a
9 year. Now, it's over ten and we haven't done a thing. In
10 fact, we've cut back in the last year. We're afraid to turn
11 the lights on any more. I reduced all 60 watt bulbs to
12 40's.

13 JUDGE NGUYEN: Well, how many bulbs do you have?

14 THE WITNESS: I have one outdoor light that burns all
15 night. That's a 40 watt bulb.

16 JUDGE NGUYEN: In the house?

17 THE WITNESS: In the house nothing burns all night.
18 There's a light in the living room. There's a light in the
19 kitchen that's a 40 watt fluorescent which is supposed to be
20 consumption. Downstairs we have -- when she's downstairs at
21 night, she uses a 60 watt bulb. Other than that, upstairs
22 I've changed everything to 40 and 25 watt bulbs and it's
23 still going up.

24 JUDGE NGUYEN: Do you have a stereo?

25 THE WITNESS: No, sir.

1 JUDGE NGUYEN: Do you have a stove that you use?

2 THE WITNESS: No, I don't cook electric. Both
3 neighbors on either side of me cook electric and their bills
4 are lower than mine.

5 MS. HOPPER: Objection, Your Honor, any reference to
6 other neighbors electric use is irrelevant to Mr. Kerwin's
7 use.

8 THE WITNESS: Why would that be?

9 JUDGE NGUYEN: Because it is not your use. Do you
10 have a refrigerator freezer?

11 THE WITNESS: One refrigerator in the kitchen and one
12 refrigerator in the basement that doesn't get used that
13 much.

14 JUDGE NGUYEN: Do you have a clock?

15 THE WITNESS: An electric clock, other than the clock
16 radio that's in my bedroom.

17 JUDGE NGUYEN: Do you have the bills before --

18 THE WITNESS: No, that's where I made this schedule
19 out.

20 JUDGE NGUYEN: Do you have the bills before 1980
21 before 1989 '88, '87, '86 do you have those bills?

22 THE WITNESS: I don't really know. I didn't bother
23 to look for them. I would imagine they're in the house
24 somewhere.

25 JUDGE NGUYEN: So the consumption in those years are

1 acceptable to you?

2 THE WITNESS: Yeah, I would assume that '89 and '90
3 were acceptable. We would have went back further but when I
4 did this schedule I got as many bills together as I could
5 and it just seemed that '89 and '90 represented what we had
6 used over a five or six year period so I didn't want to get
7 too out of hand with this. The point I was demonstrating it
8 just wasn't 1990 against '91. It was '89 and '90 were
9 fairly consistent and in 1991 it just jumped through the
10 sky.

11 JUDGE NGUYEN: So if the company is not going to
12 submit to the bills before 1989, can you give me those
13 bills?

14 THE WITNESS: I will try. I won't promise you
15 anything.

16 JUDGE NGUYEN: Fine.

17 THE WITNESS: See, the thing was we had did a little
18 survey in the neighborhood and you'll have to excuse me for
19 referring to --

20 MS. HOPPER: I'm going to object again to any
21 reference to anybody else's electric bills.

22 JUDGE NGUYEN: Don't say anything.

23 THE WITNESS: It was --

24 MS. HOPPER: The Judge has ruled on it.

25 THE WITNESS: Okay.

1 JUDGE NGUYEN: Do you have any friends or children
2 coming to the house?

3 THE WITNESS: No.

4 JUDGE NGUYEN: Your witness.

5 CROSS EXAMINATION

6 BY MS. HOPPER:

7 Q. Mr. Kerwin, I just have a couple questions
8 regarding your electric usage. You stated you have an air
9 conditioner. Is that central air conditioning?

10 A. Um-hum.

11 Q. And how do you heat your home?

12 A. Gas.

13 Q. Do you have a microwave?

14 A. Yeah, but it doesn't get used. It sits in the
15 corner in the kitchen.

16 Q. And you have a coffee maker?

17 A. Yeah, I also have night lights and all this
18 other stuff that the girl from Norristown came out and tried
19 to make a big deal out of.

20 Q. I just asked you if you had a coffee maker.

21 A. Okay.

22 Q. When did you -- has central air conditioning
23 been in your house since you owned it?

24 A. Yes.

25 Q. And has it always been two people who lived in

1 your house from 1989 on?

2 A. No, I have four children.

3 Q. You have four children?

4 A. Um-hum.

5 Q. And when did -- did they all leave at once or
6 when did the last one leave?

7 A. They got married over a period of time. In
8 fact, the youngest is getting married next month.

9 Q. And she lives with you now?

10 A. No, she lives in New York.

11 Q. And how long has it been just your wife and
12 you at the house?

13 A. Oh, four years.

14 Q. At any time of the year do your children come
15 home to spend the holidays with you over a period of time?

16 A. They all live within the area.

17 MS. HOPPER: One second, Your Honor, please.

18 BY MS. HOPPER:

19 Q. Mr. Ferwin, isn't it true that you've already
20 been given two credits on your account?

21 A. I don't know. What do you mean by that?

22 Q. Your bill has been credited. The company has
23 given you a credit to the price.

24 A. I think a sixty-seven -- sixty-seven dollar
25 bill

1 Q. And another credit was given?

2 A. I'm not aware of that.

3 Q. And are you aware of when the last time you
4 electric bill was paid?

5 A. No, I don't pay it.

6 Q. Are you surprised that there hasn't been ..
7 payment since October?

8 A. Yes, she said she's sending you money. She
9 hasn't sent you any money.

10 Q. For the record there's been no payment since
11 October. Are you aware of what your balance is?

12 A. I imagine around 2 or \$3000.

13 Q. And in any time in the past have you made
14 payment terms with Philadelphia Electric toward the past due
15 balance?

16 A. No.

17 Q. Have you maintained those payment agreements?

18 A. As far as I know. I was out of work in '83 to
19 '84 and we ran the bill up and then we got in an agreement.
20 It was \$250 a month.

21 Q. I'm talking more recently within the past two
22 years?

23 A. Not that I'm aware of, no.

24 Q. And do you use your air conditioning?

25 A. Sure, in the summer time.

1 MS. HOPPER: I have no further questions of Mr
2 Kerwin.

3 THE WITNESS: Can I ask you some questions, Your
4 Honor?

5 JUDGE NGUYEN: Not yet because there is no one for
6 you to ask. They have not testified yet.

7 THE WITNESS: Oh, okay.

8 JUDGE NGUYEN: Do you want me to admit these into the
9 record?

10 THE WITNESS: Yes, sir. And if you want I can fill
11 the rest of that out for this year.

12 JUDGE NGUYEN: You have to give two copies to the
13 Court Reporter.

14 THE WITNESS: Do you want it this way or do you want
15 me to go home and fill it out for '92 and '93 to reflect?

16 JUDGE NGUYEN: I need previous bills.

17 THE WITNESS: Well, then I'll have to dig out for
18 you. How soon do you want me to get those out for you?

19 THE WITNESS: As soon as possible.

20 JUDGE NGUYEN: 1988, '87, '86 okay.

21 JUDGE NGUYEN: Ms. Hopper, do you have this copy?

22 MS. HOPPER: Well, I have the copy attached to the
23 complaint. That will be fine.

24 JUDGE NGUYEN: Okay. And then admit the summary of
25 bills in 1989 and 1990, 1991 and 1992 into the record as

1 Exhibit A-1.

2 (Complainant's Exhibit A-1 was produced and marked
3 for identification and admitted in evidence.)

4 JUDSE NGUYEN: Thank you. You may go back to your
5 seat. Ms. Hopper?

6 MS. HOPPER: Yes. My first witness I'd like to call
7 Jean Nelson please.

8 JEAN NELSON, called as a witness, having been duly
9 sworn, was examined and testified as follows:

10 DIRECT EXAMINATION

11 BY MS. HOPPER:

12 Q. Okay. Ms. Nelson, can you please state your
13 full name for the record.

14 A. Jean Demarco Nelson.

15 Q. And by whom are you employed?

16 A. Philadelphia Electric Company.

17 Q. And you have to speak up to make sure the
18 Court Reporter and Mr. Kerwin can hear you. And how long
19 have you been employed with Philadelphia Electric Company?

20 A. Twenty-one years.

21 Q. And what is your job description? What is
22 your job position at Philadelphia Electric Company?

23 A. I'm a senior field investigator.

24 Q. And how long have you been a senior field
25 investigator?

1 A. Four years.

2 Q. And what were you prior to senior field
3 investigator?

4 A. Senior customer representative.

5 Q. And can you give us a description of what your
6 duties are as a senior field investigator?

7 A. My duties include basically investigating any
8 billing complaints that comes through the company to its
9 fullest.

10 Q. And when you say investigate a billing
11 complaint what do you mean by a billing complaint?

12 A. Any time a customer will contact the office in
13 a dispute of their billing for any reason whatsoever it is
14 part of my duty to determine what the customer's dispute is
15 and how it can be settled.

16 Q. And do you investigate both gas and electric
17 accounts?

18 A. Yes, I do.

19 Q. And when you receive a billing dispute what do
20 you generally do? If you could just give us a brief
21 overview.

22 A. There's a lot of functions involved in that.

23 Q. You don't have to state every step you do just
24 give us an idea of what generally --

25 A. Well, it really details analyzing everything.

1 that's occurred on the account; meter readings, usage,
2 appliances of properties, verifying accuracy of not the
3 meter itself but the equipment in the home in comparison to
4 the bills.

5 Q. Do you speak to the customers?

6 A. Yes, I do.

7 Q. And in the scope of your duties as a senior
8 field investigator did you conduct a field investigation at
9 the Kerwin's property?

10 A. Yes, I did.

11 Q. And what was the reason for your
12 investigation?

13 A. The increase in the bills from one year to the
14 next.

15 Q. And when did you first become involved with
16 this investigation?

17 A. September of '91.

18 Q. And can you -- what happened in September of
19 '91 that caused you to become involved in this account?

20 A. I believe it was Mr. Kerwin that contacted our
21 office -- let me double check -- regarding the increase in
22 the bills and that's how I would have gotten involved in it.
23 It was Mrs. Kerwin.

24 Q. And what happened when you received that first
25 contact from Mrs. Kerwin?

1 A. Okay. Well, what I did was what I basically
2 would have done what I normally did was started out by
3 investigating the readings on the account because there was
4 a meter change.

5 Q. And I'm going to interfere why was the account
6 changed?

7 A. It's a random sample meter change.

8 Q. What's a random sample meter change?

9 A. Old 6, dash 6 meters are removed from the
10 property yearly at a random sample.

11 Q. Okay. And when was that done?

12 A. August of '92 I believe. Let me just double
13 check my papers. I believe it was August of '92.

14 Q. If you received a call in September of '91,
15 would it be August of '91 when the meter was changed?

16 A. I'm sorry, that's correct.

17 Q. Okay.

18 A. August 26 of '92 I believe was the exact call
19 or '91 rather I take that back three times now I said it.

20 MS. HOPPER: Okay, Your Honor, I have a document here
21 that I'd like to have marked as PECO Exhibit Number 1.

22

23 (PECO Exhibit No. 1 was produced and marked for
24 identification.)

24

25 BY MS. HOPPER:

1 Q. Ms. Nelson, I'm going to show you what's been
2 marked as PECO Exhibit 1 and ask if you can identify it.

3 A. This is the test result that comes back from
4 the meter shop that says the meter was tested and they gave
5 them with these tags.

6 Q. And is that the old meter at Mr. Kerwin's
7 property?

8 A. Yes, it is. This is the original one. And
9 this is where I'm confused. I'm not positive of the date it
10 was removed but August 26, '91 was the date we tested it.

11 Q. Okay. And a new meter was installed?

12 A. Yes, it was.

13 Q. And was it the same type of meter?

14 A. No, it was not.

15 Q. And did the change of this meter in August of
16 '91 have any effect on the Kerwin's bill?

17 A. Absolutely.

18 Q. What happened?

19 A. The meter that was in the property was not
20 running accurately. It was running slow. And a new meter
21 was installed and the test results -- the test prior to
22 installation of the newer meter tested the meter to be
23 accurate.

24 Q. The new meter?

25 A. The new meter.

1 Q. And how do you know that the old meter was
2 running slow?

3 A. From the test results.

4 Q. And is that PECO Exhibit 1?

5 A. Yes, it is.

6 Q. And can you direct our attention to where the
7 test results for the first meter are on PECO Exhibit 1?

8 A. There is two test operations of the meter and
9 there's an F that says 98.6 and an L that says 89.6.

10 Q. And you're pointing to the first meter test?

11 A. The top meter test, bottom line on the left.

12 Q. And PECO Exhibit 1 is a document that's kept
13 in the ordinary course of PECO business?

14 A. Yes, it is.

15 MS. HOPPER: Your Honor, I have a document here that
16 I'd like to have marked as PECO Exhibit 2 please. I'm

17 sorry, Your Honor, I handed out the wrong document. If I

18 could have that back that's supposed to be another number

19 Okay. This is a document that we will mark as PECO 2.

20 (PECO Exhibit No. 2 was produced and marked for
21 identification.)

22 BY MS. HOPPER:

23 Q. Can you identify it?

24 A. Yes, I can. These also come out of the meter
25 shop prior to the meter being installed. It's also tested

1 and it's just basically tagged with the results on the
2 right-hand side of the card.

3 Q. And was this for the meter that was installed
4 that replaced the old meter?

5 A. Yes, and I can give you that date if you want
6 it so we can clarify that. The old meter was removed on
7 August 26 so that was a correct date of '91.

8 Q. And the new meter was installed on the same
9 date?

10 A. On the same date.

11 Q. And after the installation of this meter in
12 August of 1991 and after you were contacted by the Karpov's,
13 what did you do next on the account?

14 A. Well, first I explained -- I believe it was
15 Mr. Kerwin at the time that the meter that we removed from
16 the property was slow and now the new one is accurate but to
17 verify that I requested another meter test of that meter.

18 Q. And when you first reviewed the account in
19 September of '91 --

20 A. Yes.

21 Q. -- was there any adjustment to the bill made?

22 A. Yes, there was.

23 Q. And when was that?

24 A. There were two adjustments made.

25 Q. I'm just talking about the one in 1991.

1 A. Okay. In 1991 was -- October 4th, 1991,
2 \$78.59 was credited to the account.

3 Q. And why was that done?

4 A. Well, there was an error in the subtraction on
5 the meter set and removal and the subtraction represented
6 494 kilowatt hours and we had accidentally overbilled Mr.
7 Kerwin due to the subtraction error.

8 Q. Okay. And just so that I can make one point
9 clear. After the old meter was removed and the new meter
10 was installed, would it be unusual for the bills to increase
11 for Mr. Kerwin?

12 A. I'm sorry, repeat it.

13 Q. After the meter was changed in August of 1991,
14 did the bills increase?

15 A. Yes, they did.

16 Q. Is that unusual?

17 A. No, not at all.

18 Q. And why is that?

19 A. Because the meter operating prior was not
20 operating at it's 100 percent accuracy.

21 Q. Do you know how long the meter that was
22 changed in August of '91 had been at the property?

23 A. Actually, no, I don't. But I should have
24 on the record here if you can bear with me. There is no such
25 information on our records which means that was installed

1 prior to 1965.

2 Q. Okay. And after the credit was given in
3 October of 1991, was that the end of your involvement in
4 this case?

5 A. No, it wasn't.

6 Q. And what was the next thing that happened?

7 A. Mrs. Kerwin or Mr. Kerwin, contacted us again.

8 Q. And when was that?

9 A. I believe that was June of '92, May of '92

10 Q. And what was the reason for the contact?

11 A. It stated use increased more than twice as
12 much as last year.

13 Q. And what did you do after you received that
14 phone call?

15 A. On May 29th of '92 -- well, May of '92 I
16 requested that that meter also be tested for accuracy.

17 Q. That was the new meter?

18 A. That was the new meter.

19 Q. And was that meter tested?

20 A. Yes, it was.

21 Q. Did that meter have to be replaced?

22 A. Yes, it did.

23 Q. And why was that?

24 A. The first and third dials were found to be
25 slow and the fifth dial fast which would mean the ratio

1 would be off.

2 Q. And a new meter was installed?

3 A. Yes, it was.

4 MS. HOPPER: Your Honor, I have another document I'd
5 like to have marked as PECO Exhibit 3 if I may. Hopefully,
6 I have the right one this time.

7 (PECO Exhibit No. 3 was produced and marked for
8 identification.)

9 BY MS. HOPPER:

10 Q. Mrs. Nelson, I want to show you what's been
11 marked as PECO 3 and ask if you can identify that.

12 A. Again this is a -- they call it a meter tag.

13 Q. Um-hum.

14 A. When the meters are tested they are tagged.

15 Q. And this is the one for the latest meter that
16 was installed at the Kerwin's property?

17 A. Yes, it was.

18 Q. And the date on this PECO Exhibit 3?

19 A. November 15th of '91.

20 Q. And is PECO Exhibit 3 a document that would be
21 prepared in the ordinary course of PECO business?

22 A. Yes, it would.

23 Q. And after the new meter was installed did that
24 end the investigation?

25 A. No, it did not.

1 Q. And what happened next? What was your next
2 involvement?

3 A. Okay. Again, doing an investigation I spoke
4 with Mr. Kerwin, at that time and I explained the results of
5 the meter test and the new meter was installed. I also had
6 reviewed the account a second time not knowing that a credit
7 was applied previous on the account and readjusted the
8 account again for \$80.49 in June of '92.

9 Q. And for what time period did that second
10 adjustment cover?

11 A. That covered July 3 of '91 to September 26 of
12 '91. When the original meter was changed, the old meter was
13 changed. And I had neglected to look back in the records
14 and see that it had been done initially and offered
15 a -- offered the adjustment again.

16 Q. So you gave another credit?

17 A. Yes, I did.

18 Q. And then?

19 A. And then I offered to test the new meter that
20 was at the property also.

21 Q. And when was that third meter test done?

22 A. July second of 1992.

23 Q. And prior to July of 1992, had you spoken to
24 the Kerwins?

25 A. Yes, I had.

1 Q. And what was the purpose of your discussion?

2 A. In the billing investigation we do try over
3 the telephone to determine if there is an appliance in the
4 house that we could determine to be a cause of increased
5 use. So we do what we call a cost estimate or cost analysis
6 over the phone.

7 Q. Did you do that?

8 A. Yes, I did.

9 Q. And what were your results, briefly?

10 A. That I had no problem with the cost to operate
11 other than the fact that it was very hard to do an accurate
12 test over the telephone since I was informed that none of
13 the appliances in the home were used.

14 Q. Did you discuss with the Kerwins the effect
15 air conditioning use has on the electric billing?

16 A. Yes, I did.

17 Q. And could you tell us what you told them?

18 A. I explained basically the usage that occurred
19 in June of '92 regarding 200 kilowatt hours in six days and
20 Mr. Kerwin had mentioned to me had occurred on his meter.

21 Q. Six days?

22 A. This is Mr. Kerwin's statement that he felt
23 that the new meter was incorrect but because over 200
24 kilowatt hours were used in six days and I explained the
25 weekend that he was referring to was over a weekend where

1 the temperatures were over 80 degrees and over 90 percent
2 humidity and that is what kind of an effect an air
3 conditioner can have on a bill.

4 Q. Okay. And after the meter was tested again in
5 July of 1992, did you --

6 MR. KERWIN: Objection, Your Honor, what do you mean
7 meter was tested? There was only one test.

8 MS. HOPPER: I'm sorry. The meter was tested in July
9 of 1992.

10 MR. KERWIN: Hold on now. You're throwing stuff in
11 here that is not true. I had one fellow out to test the
12 meter that is all.

13 THE WITNESS: There were two meter tests done on the
14 property.

15 MR. KERWIN: Not to our knowledge.

16 BY MS. HOPPER:

17 Q. If I can just follow up these questions to
18 establish the record. In July of 1992, was there a meter
19 test?

20 A. Yes, there was.

21 Q. And after that July of 1992, did you go out to
22 the property?

23 A. Yes, I did.

24 Q. And when did you go out to the property?

25 A. July 23rd of 1992.

1 Q. And what was the purpose of your visit?

2 A. Again, the Kerwins got back to us. They filed
3 an informal complaint with the Public Utility Commission.
4 So my job at that time was to go to the property.

5 Q. You need to speak up.

6 A. When they file an informal complaint with the
7 Public Utility Commission, then our job is to go to the
8 property and do an analysis of the use on the premises. We
9 also do what we call dropping load at the property making
10 sure that there's no shorts, grounds or dissipation of
11 service.

12 Q. Did you find any shorts, grounds or
13 dissipation of service?

14 A. No, I did not.

15 Q. Did you do an appliance analysis at that time?

16 A. Yes, I did.

17 Q. Did you complete a document to that effect?

18 A. Yes, I did.

19 MS. HOPPER: Your Honor, at this point I have a
20 document I'd like to mark as PECO Exhibit 4 please.

21 (PECO Exhibit No. 4 was produced and marked for
22 identification.)

23 BY MS. HOPPER:

24 Q. Ms. Nelson, I'm handing you a copy of what has
25 been marked as PECO Exhibit 4 can you identify it please?

1 A. Yes, I can. This is when I was at the Kervin
2 residence on July 23rd and walking through the house and
3 unplugging appliances I did the analysis at that time.

4 Q. Okay. Did you take notes of the appliances at
5 the property?

6 A. Yes, I did.

7 Q. And what was the purpose of doing an appliance
8 analysis?

9 A. To determine whether or not the usage is in
10 line with the bills they're being rendered. And it also
11 helps to establish in doing the dropping loads and checking
12 for grounds, shorts and dissipations. It also helps to
13 determine if one of those appliances could be
14 malfunctioning.

15 Q. And if we could go through PECD Exhibit 4 and
16 if you could explain on the record what you found at the
17 property.

18 A. Basically I didn't even include in this
19 lighting or anything like that because I didn't think that
20 was necessary. There was basically one TV. That would have
21 been -- I take it back there was more than one TV at the
22 property but I allow for one TV operating on an average. I
23 took for consideration of a refrigerator plugged in in the
24 kitchen and down in the basement there was a microwave that
25 I was informed was rarely used.

1 Q. And did you allow usage for that?

2 A. Yes, I did.

3 Q. The coffee maker I did allow for usage on
4 that. I added in a few night lights and a couple clocks
5 that I found at the premises. Just for record purposes a
6 washer and dryer and I allowed for three loads a month. I
7 believe that was a month -- let me double check that -- yes,
8 for three loads a month. A furnace fan, they have a hot air
9 system with the furnace fan that when I arrived at the
10 property was on and it's on the on position not the
11 automatic position so it would run all the time.

12 Q. And the furnace fan what does that affect?

13 A. In what respect?

14 Q. I'm sorry. What is the furnace fan?

15 A. When you have a hot air system even though the
16 heater itself may go through the house it needs a fan to
17 blow it through the house and that fan was on the on
18 position rather than the automatic position. On the
19 automatic position it will go off or on as the heater or air
20 conditioner will call for. With it being in the on position
21 it runs continually.

22 Q. And you allotted for that?

23 A. Yes, I did and I put two figures on the sheet.
24 I figured it out twelve hours a day and at four hours a day
25 364 kilowatt hours a month.

1 Q. What else did you find at the property?

2 A. The central air conditioning which I took a
3 reading off of it which I found to be 5600 watts.
4 averaged out the air conditioning based on and I'm not
5 positive I can read this -- do you have the original or do
6 I? It's probably clearer on the original.

7 Q. I don't believe I have the original.

8 A. Okay. I looked at four hours a day for the
9 air conditioner and that's the figure that I came up with at
10 four hours a day trying to average out days that it would
11 have ran and days that it would not have ran.

12 Q. And did you find anything else at the
13 property?

14 A. A dishwasher which I don't believe I allowed
15 for originally because I think they said they don't use the
16 dishwasher. Basically that would be it.

17 Q. Okay. And what were the results of your
18 appliance analysis compared to the Kerwin's bill?

19 A. I estimated the bills to be roughly about 1.4
20 daily average use.

21 Q. And what do you mean by daily average use?

22 A. Taking a monthly kilowatt hour consumption and
23 dividing it over the number of days in billing to come up
24 with the daily average.

25 Q. And how did your analysis compare with the

1 actual daily average use with the Kerwins?

2 A. During that period of time; June, July and
3 August the daily average ran 31 a day, 46.8 and 40.8

4 Q. The actual daily average use?

5 A. Yes, that was actual.

6 MS. HOPPER: All right. Your Honor, I have another
7 document that I ask be marked as PECO Exhibit 5.

8 (PECO Exhibit No. 5 was produced and marked for
9 identification.)

10 BY MS. HOPPER:

11 Q. Ms. Nelson, can you identify PECO Exhibit 5?

12 A. Yes, this is just a chart of daily average
13 consumption on a monthly basis from year to year.

14 Q. And is this for the Kerwin's property?

15 A. Yes, it is.

16 Q. And what period of time does this cover?

17 A. '89 through '93.

18 Q. And is this what you were referring to when
19 you were comparing the ADU from PECO Exhibit 4?

20 A. Yes, it is.

21 Q. Okay. And for the record you were referring
22 to some numbers, if you could refer to PECO Exhibit 5 to
23 make the record more clear how it compared with your
24 analysis.

25 A. Okay. If -- on the sheet in 1992 because I

1 was at the property July of '92 you'll see that the going
2 across June is 31.0, July was 46.8 and August is 40.8. And
3 in estimating the kilowatt hour consumption at 41.4 with
4 only four hours a day in air conditioning I see no problem
5 at all with my analysis.

6 Q. Okay. And if you could -- referring to PECC
7 Exhibit 5 in the course of your investigation, did you
8 compare the daily use over the various years?

9 A. Yes, I did.

10 Q. And what did you find?

11 A. The usage definitely had increased after the
12 new meter had been installed.

13 Q. Did it increase significantly?

14 A. What do you mean by significant?

15 Q. I mean if you compare take 1991 and 1992 for
16 example --

17 A. Right.

18 Q. -- if you start from January and go through
19 December and compare the two.

20 A. Yes.

21 Q. And I believe there is a meter change in
22 there?

23 A. Yes.

24 Q. If you could go through that.

25 A. I would say yes it considerably increased the

1 bill.

2 Q. Okay. And in your experience as a field
3 investigator, can you state any causes for that?

4 A. First of all, the meter's accuracy the car
5 that was removed from the property being slow will
6 definitely have an effect because in all honesty, as a field
7 investigator, you don't know what the meter's accuracy is at
8 any point until it's tested. Secondly, it was also the
9 hottest summer on record in quite a number of years. So air
10 conditioning would have had a major affect on the bill. And
11 obviously, the usage that was not registering fully on the
12 meter was then picked up on the new meter.

13 Q. Okay. After the meter change in August of
14 1991 which is marked on PECO Exhibit 5.

15 A. Yes.

16 Q. Can you -- did you compare the ADU, average
17 daily use for that time period?

18 A. Yes, I did.

19 Q. And did you note any increase in the bills?

20 A. For June yes, I did.

21 Q. And for any other month?

22 A. All of them they stayed consistent after that.

23 Q. Okay. If you compare September of '91 to
24 September of '92, how did that compare?

25 A. September of '91 was actually slightly higher

1 than September of '92.

2 Q. Okay. And comparing January of '92 with
3 January of '93.

4 A. Is that 29 on '92 on the original?

5 Q. I believe so.

6 A. Right in line.

7 Q. Okay. And after your field visit in July of
8 1992, did you do anything else with respect to this account?

9 A. Yes.

10 Q. And were submeters placed?

11 A. It's not submetering.

12 Q. I'm sorry, what's it called?

13 A. It's called a load survey.

14 Q. And what is a load survey?

15 A. It is equipment that is placed on both the
16 circuit breakers. If we can -- the circuit breakers are on
17 the other side of the meter so we can monitor what is
18 registering in the house on a 24 hour basis. And if we can,
19 if the circuit breakers are identified as individual
20 breakers to a certain appliance we can meter those
21 appliances separately so we can get a full half hour load
22 study of everything that is registering on the property
23 and we can break it down when we breakdown the breakers. I
24 don't do the load survey. There is a group that does that.

25 Q. Did you order one for the Kerwin's property?

1 A. Yes, I did.

2 Q. And when was that ordered do you know?

3 A. I can tell you when it was done.

4 Q. That's fine when it was done.

5 A. Okay. Because it was installed April of '92.

6 MS. HOPPER: Okay. Your Honor, at this point I'd

7 like to have two documents marked PECO Exhibit 6 and 7

8 (PECO Exhibits Nos. 6 and 7 were produced and marked
9 for identification.)

10 BY MS. HOPPER:

11 Q. Calling your attention to PECO Exhibit 6 can
12 you identify it please.

13 A. This is the results of the load survey group.

14 Q. And what do you mean the results of the load
15 survey?

16 A. The load study that was done.

17 Q. And were certain appliances studied?

18 A. The only ones that we could monitor separately
19 was the heating system and the dryer.

20 Q. Okay. And within PECO Exhibit 7 which pages
21 refer to the heating system and which pages refer to the
22 dryer?

23 A. Okay. Page -- I guess you want me to number
24 them the first one being one. Number two will start the
25 heater. These are out of order. Let's see, three documents

1 belong where it is, four would be the dryer.

2 MR. KERWIN: Question please, how are you identifying
3 what is what?

4 THE WITNESS: At the top of the page will tell you
5 whether it's the total load, the dryer or the heater and
6 that's why I said they're out of order. They have an order
7 to them that you start with heater. That's what I'm saying
8 I don't know where the heater went.

9 MS. HOPPER: Your Honor, there appears to be some
10 documents missing from PECO Exhibit 6. If we could take a
11 minute and make copies of this if we could take a break

12 JUDGE NGUYEN: Okay. We take a five minute recess.
13 (Whereupon, a brief recess was taken.)

14 MS. HOPPER: Your Honor, I have complete copies of
15 PECO Exhibit 6 if I could hand them out to everybody and
16 disregard the previous PECO Exhibit 6 please.

17 JUDGE NGUYEN: Okay.

18 BY MS. HOPPER:

19 Q. Okay. Ms. Nelson, the PECO Exhibit 6 that you
20 have, can you please describe the documents in full so that
21 everybody is referring to the same one.

22 A. The first sheet of it is strictly a cover
23 sheet that proceeds to tell how many kilowatt hours were
24 used total for the period and it tells you the ending period
25 of the test and then it percents how much of the load

1 factoring is on the right.

2 Q. And there are pages attached to that?

3 A. Yes, there should be three sets attached. One
4 being the total load in the house. One being strictly the
5 heating system, and one being the electric dryer on the
6 premises.

7 Q. And how many pages of each should there be?

8 A. Four. For each set there should be four.
9 There's four pages for the total load. There should be four
10 pages, yes, for the heater and there should also be four for
11 the dryer.

12 Q. And how does this test work?

13 A. What this reads and I can't tell you how the
14 test actually works it's how it reads.

15 Q. Why don't you refer to the total load portion
16 because I think everybody has four copies of that in their
17 document.

18 A. Okay. This shows half hour intervals starting
19 at 12:30, 12 to 12:30 at night which is actually 12:00 in
20 the morning all the way through to the following evening in
21 half hour intervals.

22 What you're seeing is a column that tells you what
23 time of day, that's basically military time. The next
24 column is basically showing you the kilowatt hours which is
25 1,000 watts per hour is a kilowatt hour. So 1.25 being the

1 very first identity on April 9th, 1993 at 12:30 in the
2 morning. 1.262 is 1.262 kilowatt hours or would also
3 indicate 1,262 watts at that time so it is because it
4 measures in kilowatt hours it also shows you the wattage.

5 JUDGE NGUYEN: You're reading the second page?

6 THE WITNESS: The second page of the total load

7 BY MS. HOPPER:

8 Q. Okay. And after reviewing the results of the
9 load study did you prepare a second cost estimate appliance
10 analysis?

11 A. Yes, I did.

12 Q. And is that PECO Exhibit 7?

13 A. Yes, it is.

14 Q. And can you tell us what you did how you
15 altered PECO Exhibit 7 from the previous appliance analysis?

16 A. Well, basically all I did was I had allowed
17 some -- in the first one I had allowed air conditioning at
18 this time of year air conditioning is not a factor. And I
19 also had allowed the heating system at 12 hours a day and
20 the heating system at 24 hours a day and those figures
21 didn't quite coincide 100 percent with the load survey study
22 so I did adjust them. I also adjusted the dryer because
23 three loads a month was not accurate as was discussed with
24 me previously according to the load survey it is used more
25 than three times a month.

1 Q. And how is that reflected in PECO Exhibit 7?

2 A. On the right hand column I adjusted the
3 figures to the right which would be more accurate.

4 Q. The far right?

5 A. The very far right.

6 Q. Okay. Can you read those numbers for us so
7 the record is clear as to the numbers you're referring to?

8 A. Yes, I originally allowed 18 kilowatt hours a
9 month for a dryer and load survey shows it should be about
10 55 a month the average for furnace fan was 240 and I
11 originally had allowed 360. So I adjusted that to 260 to
12 the far right and they basically are the only two that were
13 readjusted.

14 Q. And after your readjusted appliance analysis,
15 how did that compare with the current usage?

16 A. Current usage I came up with monthly kilowatt
17 hour of 818. And the current usage and again I have to
18 convert it to daily average use 818 over a 30 day period
19 would be 27.3 a day. And for 1993, the Kerwins are running
20 again referring back to PECO Number 5.

21 Q. Um-hum.

22 A. 28.5 a day, 24.8, 24.7 and 23.8.

23 Q. And how does that compare with the estimate?

24 A. It shows that the usage is in line.

25 Q. Okay. And the figures that you adjusted on

1 PECO Exhibit 7 could you explain to us again where you go
2 those figures?

3 A. Off of the load survey.

4 Q. And that's PECO Exhibit 6?

5 A. PECO Exhibit 6, yes.

6 Q. And how did you get the number 55 and 26.7?

7 A. In going to the dryer, we'll start with the
8 dryer since that's at the top. The dryer use shows that for
9 the 19 day period that the dryer was in the premises -- that
10 the equipment was on the premises 34.6 or 35 kilowatt hours
11 were registered, okay, over 19 days would give me a daily
12 average use of 1.8. And if I take that and work it back
13 into a monthly figure, it will equal 55 a month, 55 kilowatt
14 hours a month. So what I'm doing is using factual
15 information and using the daily average use based on facts.

16 Q. Okay.

17 MR. KERWIN: Sir, am I allowed to say anything or do
18 I have to wait until she's finished?

19 JUDGE NGUYEN: After she's finished.

20 MR. KERWIN: Okay.

21 MS. HOPPER: I don't believe I have any more
22 questions for Ms. Nelson.

23 JUDGE NGUYEN: Do you have any questions?

24 MR. KERWIN: Yeah, just a couple of questions. The
25 first survey that you did in the house personally okay --

1 MS. HOPPER: If you could refer to the PECO Exhibit
2 Number it would be easier.

3 CROSS EXAMINATION

4 BY MR. KERWIN:

5 Q. PECO Number 4. It was your physical presence
6 in the house. You did an estimate of usage and you came up
7 with 1245?

8 A. Yes.

9 Q. And when you metered the house, you came up
10 with 818 which means you're about 35 percent high on your
11 personal usage, right?

12 A. Can I answer that?

13 MS. HOPPER: If I could just explain to Ms. Nelson
14 after he's done asking the question then you answer it.

15 MR. KERWIN: Okay.

16 THE WITNESS: They are two different times of the
17 year. One is the middle of the summer with air conditioning
18 running.

19 BY MR. KERWIN:

20 Q. One is actual meter reading.

21 A. One is air conditioning and one is
22 non-airconditioning considered.

23 Q. But isn't it true that you were to have us
24 believe that your first actual survey that you testified
25 because of your position in the company and the authority

1 that you hold that we were to believe that this is accurate
2 and yet we found it you actually meter it you're 35 percent
3 off?

4 A. I'm not off at all because they're two
5 different times of the year. When air conditioning is
6 considered and you have over a 5,000 watt air conditioner in
7 the premises, the air conditioning use is going to differ
8 from spring, fall and winter consumption. So they are two
9 different times of the year that both of these are 100
10 percent accurate based on different times of the year.

11 Q. Would you say that my using the air
12 conditioning for June, July and August constitutes for my
13 yearly bill of 35 percent?

14 A. Yes, it would. It would constitute an
15 increase over the summer bills would justify any increase
16 that occur in the summer months.

17 Q. Okay. Let's go back to meter number two.
18 Your first -- my records indicate that you changed it in May
19 of 1991. You're testifying you changed it in August of '91.
20 Our bills jumped when you put the meter in and that was May
21 of '91. My bill jumped from '89 to 330 kilowatts to '90 it
22 was 301 and when you put the new meter in in May of '91 the
23 bill jumped to 686 kilowatts. Now, that meter stayed in and
24 we had practically begged and asked them to change it and
25 they insisted that it was accurate, that they don't put that

1 meters out. Yet, she testified that two wheels on that
2 meter were bad.

3 MS. HOPPER: You have to ask her a question.

4 BY MR. KERWIN:

5 Q. Did you not testify that two of the wheels on
6 that meter were bad? You said they were running slow.

7 A. According to the report.

8 Q. So, in fact, you do put bad meters out?

9 A. I did not test the meter. I can only go by
10 what the tester done.

11 Q. The fact was that you said that your test
12 results showed the two meters, two wheels on that meter were
13 bad and you put a third meter in at this point.

14 A. That's correct.

15 Q. All right. So the meter was bad. Now, would
16 you be surprised if I told you there was no meter even
17 connected for ten days of that month because my bill went
18 from 686 to 700 for that month that the meter was
19 disconnected from that fellow in ten days went to 807
20 kilowatts amazing no meter in and they jumped my bill.

21 JUDGE NGUYEN: If you have any questions you have to
22 ask them and if you want to testify you come here and you
23 testify. Okay?

24 MR. KERWIN: Let me explain, Your Honor, what
25 happened. On a Friday night during an electrical storm we

1 lost half the electricity in the house, so I called and the
2 fellow came out it was about 11:00 at night. To do my
3 service he had to jump because I had a bad rusty connection
4 connection inside. So he had to remove the meter and jump
5 it to give me electricity throughout the house and that was
6 Friday night and he said they had to get a new meter box
7 which they did but it took me a couple of days to get a
8 couple of bid and the following Monday which would have been an
9 ten days there was no meter involved at all.

10 JUDGE NGUYEN: Why didn't you testify about that?

11 MR. KERWIN: Now, that's when they changed the meter
12 not because the two wheels were wrong because they said to
13 the investigator Mrs. Edelstein that that meter they took
14 off is only two percent wrong yet she's telling us that the
15 wheels are bad. Now, I don't understand this.

16 JUDGE NGUYEN: I will decide that. Okay.

17 MR. KERWIN: And I'd like to know --

18 JUDGE NGUYEN: If you have any questions, just ask
19 the questions and I will decide whether or not the company
20 is wrong or right okay.

21 MR. KERWIN: There is no indication on the bill that
22 it's estimate bill or anything. But I said to your fellow
23 should I call them and he said no they will be aware of it.
24 For a ten day period there was no meter absolutely running.
25 And yet, I was billed over 800 kilowatts for that same

1 period, seems strange to me, damn strange but they said
2 changed the meter and now they tell us that wheels are turning
3 and yet the test people totally investigated from the meter in
4 Pittsburgh said that the meter was only 2 percent off. Now,
5 what was it? Was the meter bad? Was it good? And is it
6 telling the truth? I mean come on.

7 JUDGE NGUYEN: What else? Do you have any other
8 questions?

9 BY MR. KERWIN:

10 Q. Well, she made a big point about the air
11 circulator the fan running on the house. Did the company
12 have a big program that said run your circuit and your gas
13 and compressor won't come on if you circulate the air?

14 A. I have no idea.

15 Q. I'd like to bring in a brochure and show it
16 It came out of 23rd Street. Oh, I was amazed when I heard
17 you testify you gave us a \$78 credit and I was aware of
18 that, thank you, because of subtraction error. I thought
19 all your billing was done on a computer.

20 MS. HOPPER: Mr. Kerwin, if you could just let her
21 answer the question before you ask her another one.

22 THE WITNESS: When a meter is changed, the removal
23 reading is submitted and a new meter is installed with zero.
24 The subtraction error is done manually not by a computer and
25 the person who's not infallible made a mistake. That's a

1 personal human error. If we fed the computer zero, you
2 know, a reading of 999 and then a reading of 777 then they
3 don't subtract because you would have to subtract the higher
4 number from the lower number. It doesn't work so it has to
5 be processed through the computer manually.

6 Q. Okay. Then there's a second adjustment of
7 \$80, what was that for?

8 A. Because unfortunately, I didn't do the initial
9 credit of \$78 when I picked up the job and I saw the
10 subtraction error, I did not look to see that someone had
11 given a previous credit, I just automatically adjusted the
12 bill. That was part of my analysis.

13 Q. Okay. I don't know. I'll tell you the truth
14 I don't think you're telling the truth.

15 MS. HOPPER: Objection, Your Honor.

16 JUDGE NGUYEN: Do you have any questions?

17 MR. KERWIN: No, what else can I ask them, Your
18 Honor?

19 JUDGE NGUYEN: So if you don't have any question,
20 then I have a question for her. Did you make any test on
21 the meter you changed on May 29, 1992?

22 THE WITNESS: I believe there is a test result on the
23 current meter also that has not been submitted. Is that the
24 one you're referring to?

25 MS. HUPPER: Your Honor, we have the meter test...

1 here who will testify as to the meter test results.

2 THE WITNESS: Because May of May 29th, 1992 when that
3 meter was changed another test was done on July 2nd of 1992.

4 JUDGE NGUYEN: Are you certain that the test was
5 accurate again?

6 THE WITNESS: The second test?

7 JUDGE NGUYEN: Um-hum.

8 THE WITNESS: I am not the meter tester. I would say
9 that yes the equipment itself is what would indicate the
10 accuracy.

11 MR. KERWIN: Your Honor, can I just inject a thought
12 here. I requested them to come out to test the meter.

13 JUDGE NGUYEN: If you want to testify, you'll have to
14 come up here and testify. If you want to ask questions, it
15 is the witness to ask the question. Okay. Thank you. Do
16 you have any questions?

17 MS. HOPPER: No. No further questions of Ms. Nelson.

18 JUDGE NGUYEN: Thank you. Anything else?

19 MS. HOPPER: Yes, I have two more witnesses, Your
20 Honor. The first one is William Hayes.

21 JUDGE NGUYEN: How about PECO --

22 MS. HOPPER: Yes, I'd like to move PECO Exhibit
23 through 7 into evidence please.

24 JUDGE NGUYEN: Do you have any objection, Mr. Kerwin?

25 MR. KERWIN: No.

1 JUDGE NGUYEN: Peco Exhibits Number 1 through 7 are
2 admitted.

3 (PECO Exhibits Nos. 1 through 7 were admitted in
4 evidence.)

5 MS. HOPPER: Okay. Thank you, Your Honor.

6 WILLIAM HAYES, called as a witness, having been duly
7 sworn, was examined and testified as follows:

8 MS. HOPPER: Okay. Your Honor, may I proceed?

9 JUDGE NGUYEN: Yes.

10 DIRECT EXAMINATION

11 BY MS. HOPPER:

12 Q. Mr. Hayes, can you please state your full name
13 for the record.

14 A. It's William Hayes.

15 Q. And by whom are you employed?

16 A. Philadelphia Electric.

17 Q. How long have you been employed by
18 Philadelphia Electric Company?

19 A. Approximately 28 years.

20 Q. And what is your position with Philadelphia
21 Electric Company?

22 A. Primarily meter tester.

23 Q. And how long have you been a meter tester?

24 A. Approximately 15 years.

25 Q. And what are your duties as a primary meter

1 tester?

2 A. Install, test and prepare electric meters,
3 commercial, residential and industrial.

4 Q. And at any point in the scope of your
5 responsibilities did you test the meter at Mr. Kerwin's
6 property?

7 A. Yes, I did.

8 Q. And before we go into that can you briefly
9 describe what's involved in testing a residential meter?

10 A. We have a portable tester and what we do is
11 put an adapter on a customer's meter box; put the meter in
12 and the test proceeds then. You test full load and light
13 load and you record the accuracy on the sheet.

14 Q. When you say full load and light load what
15 does that mean?

16 A. Full load is approximately -- well, for a 9
17 dash meter it's tested at 30 amps and light load is tested
18 at 3 amps.

19 Q. Okay. And the meter that you tested at Mr.
20 Kerwin's property was that a 9 dash meter?

21 A. Yes, it was.

22 MS. HOPPER: Okay. Your Honor, at this point I have
23 another Exhibit that I'd like to have marked as PECO Exhibit
24 8.

25 (PECO Exhibit No. 8 was produced and marked for
identification.)

1

2 BY MS. HOPPER:

3 Q. Mr. Hayes, I'm showing you what's been marked
4 as PECO Exhibit 8, can you identify it please.

5 A. This is what you call a meter investigation
6 order document. This is a test document.

7 Q. And is this the document from the test that
8 you did?

9 A. Yes, it is.

10 Q. And when did you do this test?

11 A. May 29th, '92.

12 Q. And did you follow the procedures that you
13 just described in testing this meter?

14 A. Yes, I did.

15 Q. And can you describe for us the information
16 that's found on PECO Exhibit 8?

17 A. All right. When you first get there you take
18 an as found test. I found full load to be 100 percent and
19 light load to be 99.8.

20 Q. And can you point to us where that is on this
21 document so we're all there?

22 A. Okay. Where it says full load, top part of
23 the document.

24 Q. Okay.

25 A. And light load, top part of the document

1 right-hand side.

2 Q. Okay.

3 JUDGE NGUYEN: What does IL stand for?

4 THE WITNESS: That's for transfer rated meters.

5 BY MS. HOPPER:

6 Q. Okay. If you could continue please.

7 A. Okay. What we do we take two tests at light
8 load and two tests at full load. And we put the average
9 found at the top. And the SR was put as left, that's my
10 comments that means see remarks.

11 Q. And going down to the remarks, what does that
12 refer to?

13 A. What I did I took the as found test put
14 accuracy of the disk, rotating of the disk then when that
15 part is finished, then I over here on the right-hand side
16 has as found that's the readings. I make a notation of
17 readings. Then I take the register off and I run the dials
18 back to zero to see how far they line up. When I took them
19 back to zero, I found out that the first kilowatt hour dial
20 was six tenths slow, the third kilowatt dial was slow and
21 the fifth was fast.

22 Q. So what does that mean?

23 A. Well, what that means an experienced meter
24 reader can read that meter regardless because the dials to
25 the right determine the positions of the dials to the left.

1 A meter can be in for like a year but if the same guy reads
2 it continuously unless we get a report he'll still read it
3 meter accurately because the dials like I say to the right
4 determines the ones to the left. They have to line up

5 Q. But did you change that meter?

6 A. Yes, I did.

7 Q. And why?

8 A. Because the dials were out of line so I
9 figured even though I ran it back and gave the register a
10 check, I didn't want to run the risk of having the same
11 problem again.

12 Q. And what these -- the problems that you found
13 with the dial, does that affect how the meter registers?

14 A. Can you say that again?

15 Q. You found these problems with the dials --

16 A. The dials, right.

17 Q. How does that affect the registration of the
18 meter?

19 A. Well, like I said, it would be kind of hard
20 for an inexperienced meter reader to read it because he
21 wouldn't determine if you read it and you looked at it you
22 can see it is off. But if you read it correctly, the dials
23 to the right determine the position of the dials to the
24 left.

25 Q. Okay. But you found it to be testing

1 accurately on your as found?

2 A. Right. The registration of the meter is okay.

3 Q. Okay. The registration is okay?

4 A. Right.

5 Q. It would be a problem in reading the meter?

6 A. Yes.

7 MS. HOPPER: Okay. I'm going to show you a copy
8 of -- Your Honor, I'd like to have this marked as PECO
9 Exhibit 9.

10 (PECO Exhibit No. 9 was produced and marked for
11 identification.)

12 BY MS. HOPPER:

13 Q. Mr. Hayes, can you identify PECO Exhibit 9?

14 A. Yes, I can. It's a test document with the
15 same meter that I tested.

16 Q. Okay. Same meter or same property?

17 A. Same meter, same property.

18 Q. Okay. I call your attention to the meter
19 serial numbers they appear to be different.

20 A. Yes.

21 Q. Are they the same meters? The meter was
22 changed, wasn't it?

23 A. Yes, this is the meter that I installed.

24 Q. On PECO Exhibit 9?

25 A. Yes.

1 Q. And when was that tested?

2 A. That was tested on the seventh month. I don't
3 read that actual date. Is that the second --

4 Q. Yes.

5 A. -- of '92.

6 Q. Did you do this meter test?

7 A. O'Neill tested this meter.

8 Q. Can you interpret this meter test for us.

9 A. Okay. O'Neill did the same thing as I did.
10 He'll go to the property. He'll look at the dials first.
11 He'll read the dials where it says as found. Then he'll
12 remove the meter, put the test jack on, install a new meter.
13 He'll make the test. He'll take two tests on full load, and
14 tests on light load. He'll put the average at the top right
15 here, that's the average. He'll check the register. The
16 register is okay. He'll put it back to the same dials as
17 found and then he'll make an as found test and make sure the
18 meter is within accuracy.

19 Q. And in July of 1992, was the meter accurate?

20 A. Yes, it was.

21 Q. And can you state for the record the results
22 of the test?

23 A. Okay. He found full load 100.5, light load
24 99.8 and he left it at 99.8 on full load and 99.8 on light
25 load which is good.

1 Q. Okay. Mr. Hayes, are you familiar with
2 Philadelphia Electric company's random meter change policy?

3 A. Yes, I've changed them.

4 Q. Okay. And why is there such a policy?

5 A. Okay. These meters are basically kicked out
6 by computer. Generally old A base meters what they will do
7 is as a tester will come we test, install and change. What
8 we do is knock on the door, tell the customer we're at the
9 property and why we're here there. If there's no answer, we
10 just go ahead and change the meter. This was an A base
11 meter I believe and I put an adapter on for a socket type
12 meter and that's basically what happens and then we fill out
13 the report.

14 Q. That's for the meter that you found when you
15 were out there in May of '92?

16 A. Yes, that was changed from a random sample of
17 this.

18 Q. And are you familiar with the types of meters
19 prior to -- these are 9 dash meters. Were there different
20 meters before that?

21 A. They are 6 dash meters.

22 Q. And what's a 6 dash meter?

23 A. It's basically -- well, 9 dash meter is for
24 100 amp service and 6 dash meter is basically for 60 amp
25 service.

1 Q. Okay. And are you aware of why Philadelphia
2 Electric Company is changing the 6 dash meters?

3 A. Obsolete.

4 Q. What do you mean by obsolete?

5 A. Well, they've been in service for a period of
6 years and records show basically they run slow and the
7 customer is basically getting a break.

8 Q. What do you mean they're getting a break?

9 A. Well, if the meter is running slow and you put
10 a new meter in the accuracy will be a little higher within
11 limits. But a lower A base meter has been in service it's
12 going to run slow.

13 Q. And when you say within limits, what are the
14 limits you're referring to?

15 A. Well, we let the meter run within two tenths
16 of 100 percent slow or fast. That's what we like to have
17 them run at.

18 MS. HOPPER: Okay. I have no further questions of
19 Mr. Hayes, Your Honor.

20 JUDGE NGUYEN: Mr. Kerwin, do you have any questions
21 of the witness?

22 MR. KERWIN: Just general questions.

23 CROSS EXAMINATION

24 BY MR. KERWIN:

25 Q. I wasn't -- I had one of your fellows out to

1 test the meter and I wasn't really impressed. I sold meters
2 for a number of years and we tested clocks and you test
3 digital?

4 A. Right, portable standards.

5 Q. He was there with me for about ten minutes and
6 my meter had hardly moved but I was interested in you said
7 that the fifth meter was slow on meter number two.

8 A. The dial.

9 Q. The dial was slow and this drive was 5, 4, 3,
10 2 and 1, did you say it was fast?

11 A. Okay. The record states first kilowatt hour
12 was six tenths slow. The third kilowatt dial was slow and
13 the fifth was fast.

14 Q. Okay. Now, does 5 drive 4, 3, 2 and 1?

15 A. 1 drives 2, 2 drives 3, 3 drives 4, 4 drives
16 5. You read from the right to the left somewhat.

17 Q. What makes one wheel change the next wheel?

18 A. Okay. Here's the first wheel it's like this
19 when this wheel turns, it will turn this wheel.

20 Q. But what makes it turn? I mean, there's got
21 to be some connection what's it connected with teeth, nylon
22 gears?

23 A. Metal.

24 Q. Metal gears?

25 A. Right.

1 Q. It's all through the shaft of the disk. Or
2 disk turns and the sequence the dials will start to move.

3 Q. I had occasion to call the Westinghouse
4 people --

5 MS. HOPPER: Objection to anything he's going to say
6 about Westinghouse. Anything anybody told him from
7 Westinghouse would be hearsay.

8 JUDGE NGUYEN: Sustained.

9 MR. KERWIN: Well, I was just going to compliment him
10 so.

11 JUDGE NGUYEN: There's no need to do that.

12 BY MR. KERWIN:

13 Q. Well, being you test meters and that meter
14 that you changed on July the 2nd had been in approximately
15 14 months. Now --

16 A. July 2nd?

17 Q. Oh 5/29 the meter had been in for a year?

18 A. Right.

19 Q. And for whatever reason you changed it?

20 A. Right, it was a periodic test.

21 Q. Well, it was only a year old?

22 A. Right, but this meter here it was just changed
23 because of the dials.

24 Q. And yet the meter, that's the meter that you
25 took off?

1 A. Right.

2 Q. The company told Mrs. Edelstein it was only 3
3 percent wrong. So it wasn't a bad meter. I don't know what
4 your dials have to do with it or not. But she said it
5 wasn't a bad meter. She didn't know why they put the other
6 meter in. I think for the ten days there was no
7 registration done but that's my opinion. I don't know what
8 to ask you. I don't want to put you on the spot.

9 A. We like to be two tenths of 100 percent.

10 Q. I know Westinghouse also said the same thing.
11 But are you the only one that installs meters?

12 A. No, there's about five of us.

13 Q. In my area where I live, how many meters have
14 you installed in the last two years? Just general, I'm not
15 going to hold you down. Five? Ten?

16 A. Hundreds.

17 Q. And yet when I walked around the neighborhood
18 nobody has had their meter changed.

19 A. No, as I said it's kicked up by computer. I
20 have changed, Your Honor, I have changed a meter in a house
21 I put a new meter in and sometimes it's by the computer.
22 They like to get the old lead basis. They have top
23 priority. They like to get those out.

24 Q. Well, everybody on our street pretty much has
25 the same meters, houses were built in '50. You said the

1 meter was in there from '65. This would be ten years. ...
2 this meter was in for 25 years.

3 A. Some meters have a priority like I say and the
4 computer picks them out.

5 Q. Have you ever discussed it among yourselves. I
6 mean, why would one be in for 15 years and the next meter be
7 in for 25 years? It's not much of a computer program if
8 it's got a 15 year period on one cycle and a 25 year period.

9 A. Maybe I can best explain this say from like
10 January to March and they might have Philadelphia might have
11 this. This is done in Philadelphia, Bucks, Montgomery
12 County and they might have millions of these types of
13 meters. So they just pick like on a block they'll pick
14 many and another block so many and that's it.

15 Q. But I was the only one on my block that had my
16 meter changed.

17 A. Well, your block pro se but it could be that
18 whole neighborhood. You see, there's several hundreds of
19 houses just because you pro se have your meter changed the
20 other guys could have a socket type meter.

21 Q. Um-hum.

22 A. Like I say, it's picked out by the computer.

23 Q. The only reason I ask I'm the committee man in
24 the area. I also collect for charities so I get around the
25 neighborhood like three times a year and I'll tell you

1 nobody had their meter changed but me and in way that's not
2 your problem.

3 MR. FERWIN: Okay. That's all I have, sir.

4 JUDGE NGUYEN: I have a few questions for you. You
5 long have you been with the company?

6 THE WITNESS: I got hired in March of '64.

7 JUDGE NGUYEN: What kind of educational background do
8 you have?

9 THE WITNESS: I was a main line man for like 12 years
10 and I'm a high school graduate. I was trained from this job
11 from Philadelphia Electric Company for four years.

12 JUDGE NGUYEN: Now, you looked at PECO Exhibit Number
13 8.

14 THE WITNESS: Yes.

15 JUDGE NGUYEN: Look at the top right-hand side.

16 THE WITNESS: Right.

17 JUDGE NGUYEN: 97.8 light level.

18 THE WITNESS: No, that's 99.8. What happened, Your
19 Honor, is a green document I guess I should have brought one
20 with me.

21 JUDGE NGUYEN: No, I'm asking you if 99.9.

22 THE WITNESS: 99.8.

23 JUDGE NGUYEN: And then look at PECO Number 9.

24 THE WITNESS: Okay.

25 JUDGE NGUYEN: Low 99.97.

1 THE WITNESS: That looks like 99.9 it looks like
2 didn't press down to hard. If you look down to here
3 looks like that could have been an eight here. It just
4 didn't come through correctly.

5 JUDGE NGUYEN: What page?

6 THE WITNESS: This is PECO Number 9.

7 JUDGE NGUYEN: Number 9 um-hum 99.3?

8 THE WITNESS: No, that's an eight. When you press
9 down on this document -- it's a document that looks like
10 this. And when you're pressing down evidently he's not
11 coming down with an eight see it looks like an 8. See what
12 I mean if you bring that around it looks like an 8, 99.8.
13 Both of them are 99.8.

14 JUDGE NGUYEN: And why do you have the change? Why
15 the high load is 99.7 and --

16 THE WITNESS: Okay. What happens he took an as found
17 reading.

18 JUDGE NGUYEN: Um-hum.

19 THE WITNESS: And he has to take the register off to
20 take the as found from the register. When you put the
21 register back on, you have to put it within limits. If he
22 put that register on without making an as found test, we
23 couldn't verify the readings and they change so you have to
24 put -- we can calibrate these meters. They have to be
25 recalibrated within two tenths of 100 percent.

1 JUDGE NGUYEN: Okay.

2 THE WITNESS: Thank you.

3 JUDGE NGUYEN: Do you wish to move --

4 MS. HOPPER: Yes, I'd like to move PECO Exhibit 8 and
5 9 into the record

6 JUDGE NGUYEN: Any objection, Mr. Kerwin?

7 MR. KERWIN: No, sir.

8 JUDGE NGUYEN: Peco Exhibit Number 8 and 9 are
9 admitted.

10 (PECO Exhibits Nos. 8 and 9 are admitted in
11 evidence.)

12 MS. HOPPER: Your Honor, I have one more witness.
13 I'd like to call Mrs. Boyle to the stand.

14 CAROL BOYLE, called as a witness, having been duly
15 sworn, was examined and testified as follows:

16 DIRECT EXAMINATION

17 BY MS. HOPPER:

18 Q. Mrs. Boyle, can you please state and spell
19 your full name for the record.

20 A. Carol Boyle, C-a-r-o-l, B-o-y-l-e.

21 Q. And by whom are you employed?

22 A. I'm employed by Philadelphia Electric Company.

23 Q. What is your position with Philadelphia
24 Electric Company?

25 A. I'm the mediation coordinator.

1 Q. And what is the mediation coordinator?

2 A. I investigate formal complaints that are filed
3 against Philadelphia Electric Company with the Public
4 Utility Commission.

5 Q. And did you investigate the formal complaint
6 from Daniel J. Kerwin?

7 A. Yes, I have.

8 Q. And yours was different than Mrs. Nelson's?

9 A. Yes, it was.

10 Q. And what did you do with it?

11 A. I reviewed the report that was sent to the
12 Bureau of Consumer Services when Mr. Kerwin had filed his
13 informal complaint. I also reviewed some of the previous
14 investigation work that was done by Mrs. Nelson. With Mrs.
15 Nelson, I reviewed the decision that was rendered by the
16 Bureau of Consumer Services on the informal complaint
17 investigation and then I also analyzed the customers, including
18 Mr. Kerwin's billing for the past two years and prepared a
19 account statement of the billing that was rendered on the
20 account.

21 MS. HOPPER: Okay. Your Honor, at this point I have
22 a document which I'd like to mark as PECO Exhibit 10.

23 (PECO Exhibit No. 10 was produced and marked for
24 identification.)

25 BY MS. HOPPER:

1 Q. Mrs. Boyle, if you can identify PECO Exhibit
2 10 please.

3 A. This is an account statement that was prepared
4 from the account of Daniel Kerwin, at 122 Dewey Road
5 Cheltenham. The account statement is a three page document.
6 The first page details the residential electric billing from
7 April 4 of 1993 through April 28th of 1993 and then
8 continues with the gas, electric billing onto page two for
9 the same period. And then on page two there's a detailed
10 report of payments that were made during this period of time
11 and page three an account summary and payment terms that
12 were rendered on the account for the past two years.

13 Q. And can you describe what the account summary
14 is?

15 A. Yes, the account summary explains any balance
16 that was due on the account prior to when his billing
17 statement was prepared. So as of April 4th of 1991 the
18 balance that was due on the account was \$1,182.48 and then
19 following that is the total gas billing from April 3rd, '91
20 to April 28th and then the total electric billing from April
21 4th, '91 to April 28th, '93 total finance charges and if you
22 add the total gas, total electric and the balance due prior
23 to April of '91 plus the finance charges you'll get a total
24 of \$6,387.09. And then the total payments that were made
25 during the time of this billing statement came to \$2,402.00

1 which indicates that the account balance as of today is
2 \$3,984.06.

3 Q. And there's a section entitled payment terms

4 A. Yes, these are the payment terms that were
5 rendered with Mr. Kerwin from April of '91 to now April of
6 '93.

7 Q. And there were two payment agreements?

8 A. Yes, one was a company agreement which was on
9 October of '91. The balance at that time was approximately
10 \$886.84 and the agreement was for Mr. Kerwin, to pay \$40 a
11 month plus current bills until that balance was paid. There
12 was a decision rendered by the Bureau of Consumer Services
13 on the informal complaint that Mr. Kerwin had filed with
14 them and the balance at that time in December of '92 was
15 \$2,528.90 and the Bureau of Consumer Services was for Mr.
16 Kerwin to pay \$50 a month plus the monthly budgets which I
17 believe at that time was approximately 278 a month.

18 Q. Okay. And that budget would take into account
19 both gas and electric?

20 A. Yes, it would.

21 Q. When was the last payment made on this
22 account?

23 A. The last payment that was made on the account
24 was on October 16th of 1992 and that was for \$211.

25 Q. Okay. And you referred to the Bureau of

1 Consumer Services decision?

2 A. Yes.

3 Q. And who are the Bureau of Consumer Services?

4 A. The Bureau of Consumer Services is a
5 department or a Bureau of the Commissioners at the Public
6 Utility Commission and their job responsibilities are to
7 investigate complaints that are filed with them for all
8 utilities in the state of Pennsylvania.

9 Q. Informal complaints?

10 A. Yes.

11 MS. HOPPER: Okay, Your Honor, at this point I'd
12 like to have marked as PECO's last Exhibit PECO Exhibit 11.

13 (PECO Exhibit No. 11 was produced and marked for
14 identification.)

15 BY MS. HOPPER:

16 Q. Mrs. Boyle, can you identify PECO Exhibit 11.

17 A. Yes, this is the decision that was rendered by
18 the Bureau of Consumer Services the investigator was Eva
19 Edelstein and this decision was rendered on December the
20 10th, 1992.

21 Q. And you stated previously that the decision
22 was to pay \$50 a month plus the budget?

23 A. Correct.

24 Q. And what about the high bill allegations?

25 A. Well, the decision that was rendered by us:

1 Bureau of Consumer Service investigator details on page two
2 their position in regards to the high bill investigation.
3 If you look under investigation by staff it is outlined from
4 one to five and I believe one, two, three and four detail of
5 the position that they have taken as far as the
6 investigation on the formal complaints.

7 Q. Okay. Do you they find the bills to be out of
8 line?

9 A. No. Continued on to page three the statements
10 based on their finding was the account had been billed for
11 actual registration on all three meters and bills are
12 correct as rendered.

13 Q. And Ms. Boyle, what is Philadelphia Electric
14 company's position with respect to this account?

15 A. Philadelphia Electric Company's position in
16 regards to Mr. Kerwin's account is that all billing that has
17 been rendered to the account has been rendered accurate for
18 the investigation that was done by the company and we would
19 request for an up front payment of \$1,415 to be paid by Mr.
20 Kerwin and then we would continue to agree with the decision
21 that was rendered by the Bureau of Consumer Services for 15
22 a month plus the budget or current bills whatever Mr. Kerwin
23 would like.

24 Q. And you stated \$1,450 up-front payment on what
25 is that figure based?

1 A. That figure is based on what is due on the
2 account since the decision was rendered by the Bureau of
3 Consumer Services. The decision was rendered on December
4 10th for \$50 a month plus the monthly budget so it's
5 approximately five months so \$50 for those five months on
6 the arrearage plus the budgets that were due for those five
7 months would come up to the \$1,550.

8 MS. HOPPER: I have no further questions of Mrs.
9 Boyle, Your Honor.

10 JUDGE NGUYEN: Mr. Kerwin, do you have any question?

11 MR. KERWIN: Yes, very nice looking report but what's
12 that got to do with the meter? This looks like you're
13 trying to stick it into me.

14 THE WITNESS: Mr. Kerwin, unfortunately, this report
15 is prepared in the course of our company's business as a
16 result of the investigation that's done at your formal
17 level. It is the company's responsibility to take the
18 position in regard to your formal complaint and this
19 justifies the account balance and what is due and what our
20 position is.

21 MR. KERWIN: Very good but still doesn't have anything
22 to do with the meter.

23 JUDGE NGUYEN: Anything else?

24 MR. KERWIN: No, sir.

25 JUDGE NGUYEN: Thank you.

1 THE WITNESS: Thank you, Your Honor.

2 MS. HOPPER: Your Honor, I'd like to move PECO
3 Exhibit 10 and 11 into evidence please.

4 JUDGE NGUYEN: Do you have any objections?

5 THE WITNESS: No, sir.

6 JUDGE NGUYEN: Then Exhibit Number 10 and 11 are
7 admitted.

8 (PECO Exhibits Nos. 10 and 11 were admitted in
9 evidence.)

10 JUDGE NGUYEN: Now, if you want to make a final
11 statement then you can make it now at the --

12 MR. KERWIN: Okay. There's just two things that
13 concern me. First, was Ms. Nelson's first survey which I
14 totally disagree with. And of course she claims it's air
15 conditioning but if you're going to do a survey, you're
16 supposed to be right and she was 30 percent wrong on her
17 meter read. And I still haven't had any explanation of why
18 my bill doubled. And I still haven't had any explanation as
19 to billing from in May of 1992 when they put meter number
20 three on. Now, they're telling us that this dial is slow
21 and that dial is slow and I don't know but they also told
22 the lady from Pittsburgh Ms. Edelstein that it was 2 percent
23 wrong which said it should have stayed on.

24 There was a meter disconnected for ten days but they
25 never showed that and I don't know why and yet my bill went

1 from 686 units the year before to 807. It's amazing how you
2 have a meter disconnected and go up 125 points but there's
3 nothing wrong with the meter other than a few dials slow out
4 an expert meter reader wouldn't pick this up. And I just
5 don't see when they're telling the truth, Your Honor.

6 JUDGE NGUYEN: When?

7 MR. KERWIN: Well, when the fellow came to fix the
8 meter he had to pull it and jump it.

9 JUDGE NGUYEN: When?

10 MR. KERWIN: The exact date?

11 JUDGE NGUYEN: Month?

12 MR. KERWIN: It was May of 92 that's dated.

13 JUDGE NGUYEN: Ten days?

14 MR. KERWIN: It was off from a Friday night.

15 JUDGE NGUYEN: And you did not have a meter on your
16 premises?

17 MR. KERWIN: No, then they came and this is an
18 assumption on my part. They came and read the meter and
19 there was ten days missing and they panicked and now we got
20 meter number three installed. Now, are they implying that
21 meter number two is bad and we might as well assume that
22 meter number three is bad. At this point I don't know what
23 to believe. I'm sorry the bill is that bad. I didn't
24 realize she didn't pay it. But that's another case. I
25 still think I'm being had. The thing is you can't get

1 anybody to come down here and testify against these guys

2 The neighbors are scared of them. I've had two of
3 their employees tell me that they do have fast meters. Well,
4 I don't think these fellows would say that if it is not
5 true. Now, Ms. Nelson told me that some of those meters was
6 bad at 85 percent. This is ridiculous my bill was never
7 cheap, never cheap. And yet we find out that the meter my
8 took off honestly was only 2 percent off and yet my meter
9 has doubled. Why is my meter only off by 2 percent yet my
10 bills doubled. I don't understand it.

11 JUDGE NGUYEN: Are you finished?

12 MR. KERWIN: Yes, sir.

13 MS. HOPPER: Your Honor, briefly I would just like to
14 state that with respect to the rule which applies to high
15 billing complaints, the customer must prove a three prong
16 test; prove the number of occupants did not change, they
17 have a low possibility for use and also there were some
18 billing abnormalities. And then the burden shifts back to
19 the utilities to prove the meter test accurate and then also
20 to establish that the usage is in line with the appliances
21 at the property.

22 It's PECO's position that we have adequately met the
23 test of Waldron that the original meter that was changed in
24 August of 1991 not May of 1991 was operating slow and that
25 would have an effect on Mr. Kerwin's bills and his bills.

1 would be lower than they should be. And that when the meter
2 was changed in August of 1991, the meter was tested
3 accurately and that it was also during the hottest period.
4 It was during a very hot period which also has an effect on
5 his use since he admitted he does have central air
6 conditioning. So his bills would go up because the meter
7 was testing more accurately now. And also the air
8 conditioning use would contribute to the usage. And at that
9 point a year later Philadelphia Electric Company, not a year
10 later a little less than a year later, although the meter
11 was registering properly it would make it difficult to read
12 and the meter was changed in May of 1992. And the meter
13 that's in there now has been tested. It was installed and
14 also tested July of 1992 and has been shown to be operating
15 accurately.

16 Therefore, it's PECO's position that the bills
17 rendered to the Kerwin's have been accurate since the meter
18 change in August of 1991 and prior to that they were
19 actually lower than they should have been and also the
20 balance due and owed by the Kerwins, we would request that
21 payments be made immediately pending the outcome of your
22 decision.

23 JUDGE NGUYEN: Mr. Kerwin, I expect to receive from
24 you the bills that the company issued to you in 1988, '87,
25 1986.

1 MR. KERWIN: If I can, yes.

2 JUDGE NGUYEN: And then you send a copy of that to
3 Ms. Hopper.

4 MR. KERWIN: Okay.

5 MS. HOPPER: Your Honor, and also I will submit to
6 you Mr. Kerwin and the Court Reporter a complete copy of
7 PECO Exhibit 6.

8 JUDGE NGUYEN: Okay. The court is adjourned. Thank
9 you.

10 (Whereupon, at 11:55 a.m., the hearing recessed.)

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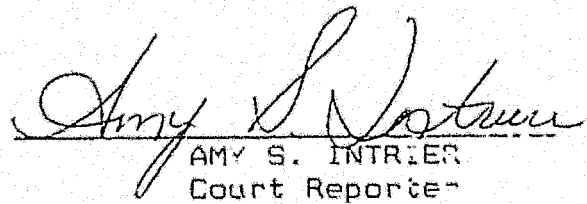
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1 I hereby certify that the proceedings and evidence
2 are contained fully and accurately in the notes taken by me
3 during the hearing of the within cause, and that this is a
4 true and correct transcript of the same.

5
6
7
8 
9 AMY S. INTRIERI
Court Reporter

10
11 The foregoing certification does not apply to any
12 reproduction of the same by any means unless under the
13 direct control and/or supervision of the certifying
14 reporter.

15 HOLBERT ASSOCIATES
16 AMY S. INTRIERI
17 2611 Doehne Road
Harrisburg, Pennsylvania 17110

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12-1-93

JUN 01 1993

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JUN 14 1993

SECRETARY'S BUREAU
Information Control Division

| | | | | | | |
|-------------------------------|------------------------|--------------|-------------------------------|----------------------|-------------------------|-----------------------|
| METER NUMBER 6-299007 | SEC 1 | CLASS 185 | EQUIP 11 | RANDOM SAMPLE 32 | REMOVE DATE 12/28/91 | 194 21-64 REV. 1 H |
| ADDRESS 122 DEWEY RD | LOC DD | TYPE MF | DIALS 4 | CONSTANT 1 | 8673 | DIALS |
| POST OFFICE CHELTENH | QUAD 42C1B1 | POLE | ACCOUNT NO 45-02-04-069816 | REMOVED BY 9-4-91 | REPLACED BY 9-4-91 | METER TAG |
| PHILADELPHIA ELECTRIC COMPANY | METER TEST STANDARD | BY | SEAL FOUND | REMOVED BY JTK | OSUAND REQ STEP | TYPE SERIAL |
| TEST DATE A. J. PERCINE | | | METER SCRAP SEP 4 - 1991 | DANIEL J KERWIN | | |

Handwritten notes:
Kerwin
1.8.93
Kerwin

Handwritten: AUG-26.8

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| | | | | | | | | |
|---------------------------|-------------------------|----------------|--------------------------|----------------|--------------------------|--|----------------------------------|---|
| ELECTRIC ORDER | DIST 40 | ROUTE 19 | TRIP 10 | POLO 821511 | PRIORITY 095 | RATE R | DATE PREPARED 12/28/90 | PHILADELPHIA ELECTRIC 194 21-64 REV. 1 |
| RANDOM SAMPLE 32 | 45 | 02 | 04 | 669816 | | | | INSTALL |
| ADDRESS 122 DEWEY RD | POST OFFICE CHELTENH | QUAD 42C1B1 | POLE | LOC DD | ASSOC. EQUIP. IN SERVICE | LEFT IN SERVICE <input type="checkbox"/> | REMOVED <input type="checkbox"/> | CUMULATOR BEFORE RESET |
| | | | | | 045-0586-1-2000 | CHARGE WORK ORDER | | POINTER |
| METER NUMBER 9-4317743 | READING 01010100 | CONSTANT 0 | DIALS 5 ⁰⁰ | MO 01 | DAY 18 | YR 91 | LEFT TURNED ON | |
| METER NUMBER 6-299007 | READING 1816713 | CONSTANT 0 | DIALS XXXXXXX | MO | DAY | YR | | |

635 4859

| | | |
|----------------------------|--------------------------------|-----------------------|
| CUSTOMER SERVICE 9/6/91 | CUSTOMER ACCOUNTS 35 9/6/91 | REMARKS SEP 4 1991 |
|----------------------------|--------------------------------|-----------------------|

F-00160324
Philadelphia
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9 4217743

- 1. DIRECTOR
- 2. ASSISTANT DIRECTOR
- 3. CHIEF OF BUREAU
- 4. DEPARTMENTAL OFFICERS
- 5. DIVISION CHIEFS
- 6. SECTION CHIEFS
- 7. ASSISTANT SECTION CHIEFS
- 8. SENIOR SPECIAL AGENTS
- 9. SPECIAL AGENTS
- 10. SENIOR INVESTIGATORS
- 11. INVESTIGATORS
- 12. CLERICAL PERSONNEL
- 13. RECORDS MANAGEMENT
- 14. COMMUNICATIONS SECTION
- 15. TRAINING SECTION
- 16. PUBLIC AFFAIRS SECTION
- 17. LABORATORY
- 18. IDENTIFICATION SECTION
- 19. FORENSIC SCIENCE SECTION
- 20. CHEMISTRY SECTION
- 21. PHYSICS SECTION
- 22. METALLURGY SECTION
- 23. POLYMER SECTION
- 24. TOXICOLOGY SECTION
- 25. BLOOD ALCOHOL SECTION
- 26. DRUG ANALYSIS SECTION
- 27. DNA ANALYSIS SECTION
- 28. FINGERPRINT SECTION
- 29. ILLUSTRATION SECTION
- 30. PHOTOGRAPHY SECTION
- 31. VIDEO SECTION
- 32. AUDIO SECTION
- 33. DOCUMENT SECTION
- 34. MISCELLANEOUS SECTION
- 35. RECEPTION
- 36. MAIL ROOM
- 37. SECURITY
- 38. JANITORY
- 39. OFFICE SUPPORT
- 40. INFORMATION SYSTEMS

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Information Control Division

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A. J. PERGINE

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A. J. PERGINE

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Page 5 of 6

A. W. FISCHER

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REGISTER

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A. W. FISCHER

F-00160324
 Philadelphia
 5/10/93 A.I.

ELECTRIC SHIPPING FORM

RECEIVED

Customer Rep: *W* *JUN 01 1993* *Nelson* Customer Name: *Kerwin*

Division Office: _____ Telephone #: _____ Refer to Customer # for all inquiries. Customer # appears on the monthly bill. Bill Estimate (1 month) \$ _____

SECRETARY'S BUREAU

Typical Household Services

| Appliance and Period of Use | Avg. One Month Watts | Average One Month KWH | Adjusted For Your Family | Appliance and Period of Use | Avg. One Month Watts | Average One Month KWH | Adjusted For Your Family |
|--|-------------------------|-----------------------------|--------------------------------|---|-------------------------|-----------------------------|--------------------------------|
| Lighting (Winter months) | | | | Laundry Service (Hrs./week) | | | |
| <input type="checkbox"/> 4 - 5 Rooms | | 50 | | <input checked="" type="checkbox"/> Washer, automatic (4) | 512 | 8 | 4 |
| <input type="checkbox"/> 6 - 8 Rooms | | 65 | | <input checked="" type="checkbox"/> Dryer 3 | 4,856 | 77 | 18 |
| <input type="checkbox"/> 9 - 12 Rooms | | 75 | | <input type="checkbox"/> Iron | 1,100 | 18 | |
| <input type="checkbox"/> Outdoor Floodlight | 214 | 71 | | Water Heating: (More than any other electric service, water heating is affected by the size of a family and the habits and ages of its members. The following formula attempts to recognize such variables.) | | | |
| Television, Radio and Stereo (Hrs./day) | | | | <input type="checkbox"/> For one adult | 4,474 | 250 | |
| <input type="checkbox"/> Television, color (tube type) (8) | 300 | 72 | | <input type="checkbox"/> Infants up to 18 months of age | | 125 | |
| <input checked="" type="checkbox"/> Television, color (solid state) (8) | 200 | 48 | 40 | <input type="checkbox"/> Add for each additional adult or child | | 75 | |
| <input type="checkbox"/> Television, B & W (tube type) (8) | 160 | 38 | | Heating, Air Conditioning and Ventilation | | | |
| <input type="checkbox"/> Television, B & W (solid state) (8) | 55 | 13 | | Heating plant, in peak season | | | |
| <input type="checkbox"/> Radio (tube type) (3) | 71 | 6 | | <input type="checkbox"/> Room Heater (2 hrs./day) | 1,300 | 78 | |
| <input type="checkbox"/> Radio (solid state) (3) | 25 | 2 | | <input type="checkbox"/> Quartz Heater (10 hrs./day) | 1,500 | 450 | |
| <input type="checkbox"/> Radio/Record Player (3) | 109 | 10 | | <input type="checkbox"/> Oil Burner or Stoker Motor (Peak) | 266 | 64 | |
| <input type="checkbox"/> Stereo set, portable (4) | 42 | 5 | | <input checked="" type="checkbox"/> Furnace Fan, air system (Peak) | 400 | 240 | 360 |
| <input type="checkbox"/> Stereo set, large console (4) | 208 | 25 | | <input type="checkbox"/> Circulator, water system (Peak) | 250 | 150 | 150 |
| Refrigeration | | | | <input type="checkbox"/> *Air Conditioner (Window) | 1,500 | 360 | |
| <input type="checkbox"/> Refrig.-Freezer (Man. Defrost) 14 cu. ft. | 326 | 100 | | 12,000 BTU/Hr. (1 Ton, 8 hrs./day) | | | |
| <input type="checkbox"/> Refrig.-Freezer (Part. Defrost) 14 cu. ft. | 505 | 160 | 150 | <input checked="" type="checkbox"/> *Air Conditioner (Central) | 4,500 | 1,600 | 607 |
| <input checked="" type="checkbox"/> Refrig.-Freezer (Auto. Defrost) 14 cu. ft. | 615 | 200 | 200 | 36,000 BTU/Hr. (3 Tons, 10 hrs./day) | 5,060 | | |
| <input type="checkbox"/> Refrig.-Freezer (Side by Side) | 750 | 300 | | <input type="checkbox"/> Window Fan (Peak) | 171 | 30 | |
| <input type="checkbox"/> Freezer (Man. Defrost) 15 cu. ft. | 341 | 100 | | <input type="checkbox"/> Desk Type Fan (Peak) | 88 | 7 | |
| <input type="checkbox"/> Freezer (Auto. Defrost) 15 cu. ft. | 440 | 150 | | <input type="checkbox"/> Kitchen Exhaust Fan | 88 | 5 | |
| Cooking | | | | <input type="checkbox"/> Dehumidifier (Peak) | 525 | 300 | |
| <input type="checkbox"/> Range | 12,200 | 150 | | <input type="checkbox"/> Humidifier (Peak) | 177 | 35 | |
| <input type="checkbox"/> Microwave Oven (Based on full use) | 1,500 | 40 | 10 | <input type="checkbox"/> Attic Fan (Peak) | 370 | 48 | |
| <input type="checkbox"/> Roaster (3 Hrs./week) | 1,333 | 16 | | Other Services | | | |
| <input type="checkbox"/> Deep Fat Fryer (1 Hr./week) | 1,448 | 6 | | <input checked="" type="checkbox"/> Dishwasher with heater (2 cycles/day) | 1,200 | 48 | |
| <input type="checkbox"/> Fry Pan (3 Hrs./week) | 1,196 | 14 | | <input type="checkbox"/> Bed Covering (Peak) | 177 | 24 | |
| <input type="checkbox"/> Broiler or Rotisserie (1.5 Hrs./wk) | 1,436 | 8 | | <input type="checkbox"/> Hair Dryer (15 min./day) | 1,500 | 10 | |
| <input type="checkbox"/> Toaster (1 Hr./week) | 1,146 | 2 | | <input type="checkbox"/> Water Pump | | | |
| <input type="checkbox"/> Sandwich Grill or Hot Plate (1 Hr./wk) | 1,161 | 2 | | <input type="checkbox"/> Shallow | 1,060 | 30 | |
| <input type="checkbox"/> Coffee Maker (2 Hrs./week) | 894 | 7 | | <input type="checkbox"/> Deep | 1,736 | 60 | |
| <input checked="" type="checkbox"/> Drip Coffee Maker (1 Hr./day) | 1,400 | 38 | 38 | <input type="checkbox"/> Lawn Mower (Peak) | 780 | 5 | |
| <input type="checkbox"/> Slow Cooker | 175 | 11 | | <input type="checkbox"/> Vacuum Cleaner (3 Hrs./week) | 630 | 7 | |
| Miscellaneous Appliances: (Multiply 2 KWH times each check) | | | | <input type="checkbox"/> Swim Pool circ. pump & filter system | 575 | 410 | |
| <input type="checkbox"/> Blender | | | | Above-ground or in-ground pools @ 24 hrs./day | | | |
| <input type="checkbox"/> Bottle Warmer | | | | <input type="checkbox"/> Heating Cable 10 / ft. | | | |
| <input type="checkbox"/> Can Opener | | | | <input type="checkbox"/> Water Bed Heater | 360 | 108 | |
| <input type="checkbox"/> Egg Cooker | | | | (Thermostat cycle 10 Hrs./day in cool weather) | | | |
| <input type="checkbox"/> Food Mixer | | | | | | | |
| <input type="checkbox"/> Ice Cream Freezer | | | | | | | |
| <input type="checkbox"/> Juicer | | | | | | | |
| <input type="checkbox"/> Knife Sharpener | | | | | | | |
| <input type="checkbox"/> Sauce Pan | | | | | | | |
| <input type="checkbox"/> Waffle Iron | | | | | | | |
| <input type="checkbox"/> Warming Tray | | | | | | | |
| <input type="checkbox"/> Waste Disposal | | | | | | | |
| <input type="checkbox"/> Heat Lamp | | | | | | | |
| <input type="checkbox"/> Heating Pad | | | | | | | |
| <input type="checkbox"/> Razor | | | | | | | |
| <input type="checkbox"/> Tooth Brush | | | | | | | |
| <input type="checkbox"/> Vibrator | | | | | | | |
| <input checked="" type="checkbox"/> Clock | | | | | | | |
| <input type="checkbox"/> Floor Polisher | | | | | | | |
| <input type="checkbox"/> Sewing Machine | | | | | | | |
| <input type="checkbox"/> Sun Lamp | | | | | | | |
| <input type="checkbox"/> Tape Recorder | | | | | | | |
| <input type="checkbox"/> Workshop Equip. | | | | | | | |

KWH Subtotal (Column A) *15000 - 1415 / 1400* KWH Subtotal (Column B) *1500*

Total 1 month KWH estimate *1243*

JUN 14 1993 How to Estimate Your Electric Service Bill

- Identify the appliances you use in your home.
- The table shows monthly KWH usage for specific appliances. It lists average power in watts and total consumption in KWH.
- Size of family, appliances and living habits affect electric use. Adjust the "Average One Month KWH" for each appliance on the table according to your family size and use of those appliances.
- More precise figures can be obtained by substituting watt ratings of your appliances and the monthly usage for those appliances. (Watt ratings are usually indicated on the specification label.)
Multiply watts (on label) times hours used per month and divide by
- Example: 75 watt bulb used 60 hours. (2 hours per day)
75 watts X 60 hours = 4,500 Watt Hours
4,500 ÷ 1,000 = 4.5 KWH
- Enter estimated KWH amount for each appliance in the right-hand columns. Add the entries to obtain your 1 month KWH use.
- Your average cost per KWH is determined by dividing your total bill (include all charges) by the KWH used.
Example: \$59.59 ÷ 750 KWH = \$0.079 or 8.0¢
- To estimate the cost per month for a particular appliance, multiply KWH times your average cost per KWH. *Philadelphia*

KERWIN

1989

1990

1991

1992

AV. RUSH - DAY

AV. RUSH - DEE

AV. RUSH - BNY

AV. RUSH - EBY

| DATE | AV. RUSH - DAY | AV. RUSH - DEE | AV. RUSH - BNY | AV. RUSH - EBY |
|------|----------------|----------------|----------------|----------------|
| JAN | 21.3 | 19.1 | 15.3 | 24.0 |
| FEB | 13.8 | 10.3 | 11.0 | 25.0 |
| MAR | 10.4 | 8.7 | 13.0 | 24.0 |
| APR | 7.9 | 7.9 | 9.9 | 14.9 |
| MAY | 7.9 | 8.5 | 9.5 | 26.9 |
| JUNE | 11.0 | 9.4 | 35.1 | 31.0 |
| JULY | 19.7 | 25.2 | 27.2 | 46.8 |
| AUG | 29.8 | 28.7 | 36.7 | 40.8 |
| SEP | 29.2 | 27.4 | 36.9 | 32.4 |
| OCT | 22.1 | 17.7 | 24.9 | 25.7 |
| NOV | 10.9 | 13.3 | 27.5 | 22.7 |
| DEC | 9.5 | 9.5 | 30.9 | |

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H. Change 5-24-92

H. Change 2-26-91

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Philadelphia F-001603
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5/10/93
Revised 8/18/83
A.I.

ELECTRIC METER SERVICES DIVISION
LOAD SURVEY GROUP
VALLEY FORGE CENTER

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JUN 14 1993

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JUN 01 1993

DANIEL J. KERWIN
122 DEWEY ROAD
CHELTENHAM, PA. 19012

SECRETARY'S BUREAU
Information Control Division

LOAD STUDY

BUSINESS CLASS: RESIDENTIAL

DATE: MAY 4, 1993

SUMMARY:

AS REQUESTED BY JEANNE NELSON, CUSTOMER SERVICE, PLYMOUTH S.B., TEST EQUIPMENT WAS INSTALLED AT THE ABOVE LOCATION TO DETERMINE THE LOAD CHARACTERISTICS ON THE PECO SERVICE.

LOAD CHARACTERISTICS
(TEST PERIOD: FROM 4/9/93 THRU 4/28/93)

| <u>LOAD MEASURED</u> | <u>ENERGY USE KILOWATTHOURS</u> | <u>30-MINUTE MAXIMUM DEMAND PERIOD ENDING</u> | | <u>LOAD FACTOR, PERCENT</u> | |
|----------------------|-------------------------------------|---|-------------|---------------------------------|------------------|
| | | <u>TIME</u> | <u>DATE</u> | | <u>KILOWATTS</u> |
| TOTAL LOAD | 454.932 | 8:00PM | 4/27/93 | 6.546 | 14.5 |
| HEATER | 168.797 | 9:30PM | 4/12/93 | 0.677 | 52.0 |
| DRYER | 34.634 | 1:00PM | 4/13/93 | 4.796 | 1.5 |

REMARKS:

THE CUSTOMER IS SUPPLIED WITH ENERGY FROM A 120/240 VOLT, THREE-WIRE SINGLE PHASE SERVICE METERED BY BILLING METER #9-4225534.

TABULATIONS OF CLOCK HALF-HOUR DEMANDS FOR THE TEST PERIOD ARE SUBMITTED WITH THIS REPORT AS COMPUTER PRINTOUTS.

THE TEST HAS BEEN COMPLETED.

TEST BY: RPS
REPORT BY: MAH

DOCUMENT
FOLDER

PE Blounguit
IN CHARGE OF TEST

Philadelphia
F-00160324

5110193 *PELO CO A.I.*

DANIEL KERWIN 122 DEWEY RD. CHELTENHAM, PA. 19012 HEATER

05:05:23 10:09:05

INDIVIDUAL CUSTOMER LOAD CHARACTERISTICS
REPORT NUMBER 99 1 CUSTOMER(S)
TEST PERIOD: 20 DAYS, FROM 4/9/93 THRU 4/28/93

| CUSTOMER NUMBER | TOTAL USE KWH | LOAD FACTOR PERCENT | MAXIMUM DEMANDS (E S T) |
|-----------------|---------------|---------------------|--------------------------------|
| | | | INTEGRATED CLR + HALF-HOUR |
| | | | KILOWATTS DATE DAY TIME ENDING |
| 93 109 | 168.797 | 52.0 | 0.677 4/12/93 MON 2:30 |

TEST PERIOD USE-TOTAL GROUP 168.797 KWH
TEST PERIOD USE-AVERAGE CUSTOMER 168.797 KWH

NONCOINCIDENT MAXIMUM DEMAND-TOTAL GROUP 0.677 KILOWATTS
NONCOINCIDENT MAXIMUM DEMAND-AVERAGE CUSTOMER 0.677 KILOWATTS

GROUP DAILY LOAD CHARACTERISTICS - INTEGRATED CLOCK HALF-HOUR TEST WEEK
 GROUP NUMBER 99 1 CUSTOMER(S)
 TEST PERIOD: 20 DAYS FROM 4 9/93 THRU 4/28/93
 DIVERSIFIED DEMANDS (TOTALIZED) KILOWATTS

| INTERVAL ENDING | 4/9/93 FRIDAY | 4/10/93 SATURDAY | 4/11/93 SUNDAY | 4/12/93 MONDAY | 4/13/93 TUESDAY | 4/14/93 WEDNESDAY | 4/15/93 THURSDAY |
|-----------------|---------------|------------------|----------------|----------------|-----------------|-------------------|------------------|
| 0030 | 0.450 | 0.445 | 0.443 | 0.450 | 0.445 | 0.443 | 0.448 |
| 0100 | 0.450 | 0.445 | 0.441 | 0.446 | 0.443 | 0.443 | 0.448 |
| 0130 | 0.452 | 0.448 | 0.443 | 0.446 | 0.446 | 0.445 | 0.450 |
| 0200 | 0.454 | 0.448 | 0.443 | 0.446 | 0.446 | 0.445 | 0.454 |
| 0230 | 0.454 | 0.448 | 0.445 | 0.446 | 0.443 | 0.445 | 0.452 |
| 0300 | 0.452 | 0.448 | 0.445 | 0.445 | 0.446 | 0.445 | 0.454 |
| 0330 | 0.454 | 0.448 | 0.445 | 0.445 | 0.446 | 0.445 | 0.452 |
| 0400 | 0.452 | 0.448 | 0.445 | 0.445 | 0.446 | 0.443 | 0.448 |
| 0430 | 0.450 | 0.446 | 0.445 | 0.443 | 0.445 | 0.445 | 0.448 |
| 0500 | 0.452 | 0.448 | 0.445 | 0.443 | 0.445 | 0.443 | 0.448 |
| 0530 | 0.450 | 0.445 | 0.445 | 0.441 | 0.445 | 0.443 | 0.446 |
| 0600 | 0.450 | 0.445 | 0.445 | 0.441 | 0.445 | 0.443 | 0.448 |
| 0630 | 0.448 | 0.445 | 0.441 | 0.441 | 0.445 | 0.443 | 0.448 |
| 0700 | 0.448 | 0.443 | 0.441 | 0.443 | 0.448 | 0.436 | 0.446 |
| 0730 | 0.450 | 0.441 | 0.441 | 0.443 | 0.446 | 0.437 | 0.446 |
| 0800 | 0.452 | 0.443 | 0.441 | 0.441 | 0.445 | 0.437 | 0.445 |
| 0830 | 0.450 | 0.443 | 0.445 | 0.443 | 0.446 | 0.439 | 0.446 |
| 0900 | 0.193 | 0.443 | 0.446 | 0.443 | 0.445 | 0.441 | 0.446 |
| 0930 | 0.101 | 0.443 | 0.446 | 0.441 | 0.445 | 0.441 | 0.446 |
| 1000 | 0.094 | 0.443 | 0.446 | 0.441 | 0.445 | 0.443 | 0.445 |
| 1030 | 0.059 | 0.445 | 0.446 | 0.441 | 0.445 | 0.443 | 0.445 |
| 1100 | 0.099 | 0.441 | 0.448 | 0.443 | 0.445 | 0.441 | 0.448 |
| 1130 | 0.052 | 0.443 | 0.446 | 0.443 | 0.445 | 0.441 | 0.448 |
| 1200 | 0.050 | 0.439 | 0.446 | 0.437 | 0.373 | 0.439 | 0.058 |
| 1230 | 0.050 | 0.441 | 0.446 | 0.437 | 0.103 | 0.437 | 0.094 |
| 1300 | 0.000 | 0.439 | 0.450 | 0.439 | 0.081 | 0.436 | 0.050 |
| 1330 | 0.000 | 0.441 | 0.452 | 0.441 | 0.070 | 0.434 | 0.077 |
| 1400 | 0.000 | 0.441 | 0.452 | 0.441 | 0.101 | 0.441 | 0.070 |
| 1430 | 0.000 | 0.441 | 0.450 | 0.439 | 0.081 | 0.448 | 0.004 |
| 1500 | 0.000 | 0.441 | 0.448 | 0.441 | 0.068 | 0.446 | 0.000 |
| 1530 | 0.000 | 0.443 | 0.448 | 0.437 | 0.002 | 0.446 | 0.000 |
| 1600 | 0.011 | 0.441 | 0.448 | 0.441 | 0.000 | 0.446 | 0.043 |
| 1630 | 0.277 | 0.441 | 0.446 | 0.441 | 0.043 | 0.445 | 0.000 |
| 1700 | 0.050 | 0.443 | 0.448 | 0.439 | 0.043 | 0.445 | 0.000 |
| 1730 | 0.000 | 0.441 | 0.446 | 0.441 | 0.043 | 0.445 | 0.043 |
| 1800 | 0.000 | 0.443 | 0.446 | 0.441 | 0.045 | 0.441 | 0.043 |
| 1830 | 0.000 | 0.439 | 0.443 | 0.437 | 0.000 | 0.437 | 0.000 |
| 1900 | 0.000 | 0.437 | 0.441 | 0.434 | 0.000 | 0.443 | 0.050 |
| 1930 | 0.000 | 0.437 | 0.439 | 0.437 | 0.000 | 0.443 | 0.000 |
| 2000 | 0.000 | 0.439 | 0.443 | 0.436 | 0.000 | 0.441 | 0.000 |
| 2030 | 0.000 | 0.439 | 0.443 | 0.437 | 0.043 | 0.445 | 0.000 |
| 2100 | 0.000 | 0.441 | 0.439 | 0.437 | 0.043 | 0.445 | 0.000 |
| 2130 | 0.016 | 0.439 | 0.441 | 0.437 | 0.050 | 0.443 | 0.000 |
| 2200 | 0.027 | 0.437 | 0.445 | 0.441 | 0.043 | 0.445 | 0.202 |
| 2230 | 0.043 | 0.441 | 0.446 | 0.441 | 0.036 | 0.445 | 0.439 |
| 2300 | 0.041 | 0.441 | 0.448 | 0.445 | 0.441 | 0.446 | 0.439 |
| 2330 | 0.072 | 0.443 | 0.448 | 0.445 | 0.441 | 0.446 | 0.441 |
| 2400 | 0.203 | 0.443 | 0.446 | 0.443 | 0.445 | 0.450 | 0.443 |
| TOTAL KWH | 4.533 | 10.623 | 10.685 | 10.711 | 6.379 | 10.525 | 6.019 |

GROUP DAILY LOAD CHARACTERISTICS - INTEGRATED CLOCK HALF-HOUR (E.S.T.)

GROUP NUMBER 99 1 CUSTOMER(S)
 TEST PERIOD: 20 DAYS FROM 4/9/93 THRU 4/28/93
 TEST WEEK 1 DIVERSIFIED DEMANDS (TOTALIZED)

| INTERVAL ENDING | 4/16/93 FRIDAY | 4/17/93 SATURDAY | 4/18/93 SUNDAY | 4/19/93 MONDAY | 4/20/93 TUESDAY | 4/21/93 WEDNESDAY | 4/22/93 THURSDAY |
|-----------------|-------------------|---------------------|-------------------|-------------------|--------------------|----------------------|---------------------|
| 0030 | 0.567 | 0.443 | 0.441 | 0.443 | 0.446 | 0.446 | 0.445 |
| 0100 | 0.445 | 0.441 | 0.446 | 0.445 | 0.443 | 0.448 | 0.446 |
| 0130 | 0.443 | 0.439 | 0.524 | 0.445 | 0.445 | 0.448 | 0.446 |
| 0200 | 0.443 | 0.439 | 0.448 | 0.446 | 0.445 | 0.448 | 0.448 |
| 0230 | 0.445 | 0.439 | 0.450 | 0.445 | 0.445 | 0.446 | 0.448 |
| 0300 | 0.445 | 0.441 | 0.448 | 0.446 | 0.445 | 0.446 | 0.448 |
| 0330 | 0.445 | 0.441 | 0.448 | 0.445 | 0.445 | 0.446 | 0.448 |
| 0400 | 0.443 | 0.439 | 0.448 | 0.445 | 0.445 | 0.446 | 0.446 |
| 0430 | 0.443 | 0.441 | 0.448 | 0.445 | 0.445 | 0.446 | 0.446 |
| 0500 | 0.443 | 0.439 | 0.448 | 0.443 | 0.448 | 0.443 | 0.443 |
| 0530 | 0.445 | 0.441 | 0.448 | 0.443 | 0.448 | 0.443 | 0.437 |
| 0600 | 0.445 | 0.441 | 0.448 | 0.443 | 0.446 | 0.443 | 0.437 |
| 0630 | 0.443 | 0.446 | 0.448 | 0.443 | 0.446 | 0.443 | 0.421 |
| 0700 | 0.443 | 0.437 | 0.445 | 0.445 | 0.446 | 0.443 | 0.113 |
| 0730 | 0.443 | 0.437 | 0.445 | 0.446 | 0.446 | 0.446 | 0.121 |
| 0800 | 0.445 | 0.437 | 0.445 | 0.448 | 0.446 | 0.446 | 0.113 |
| 0830 | 0.445 | 0.443 | 0.446 | 0.450 | 0.432 | 0.070 | 0.135 |
| 0900 | 0.445 | 0.443 | 0.446 | 0.448 | 0.047 | 0.000 | 0.115 |
| 0930 | 0.445 | 0.443 | 0.446 | 0.448 | 0.000 | 0.000 | 0.115 |
| 1000 | 0.445 | 0.443 | 0.446 | 0.448 | 0.000 | 0.000 | 0.115 |
| 1030 | 0.445 | 0.443 | 0.446 | 0.448 | 0.000 | 0.043 | 0.113 |
| 1100 | 0.445 | 0.443 | 0.446 | 0.448 | 0.000 | 0.000 | 0.113 |
| 1130 | 0.446 | 0.445 | 0.448 | 0.449 | 0.000 | 0.000 | 0.106 |
| 1200 | 0.445 | 0.443 | 0.448 | 0.445 | 0.000 | 0.043 | 0.090 |
| 1230 | 0.445 | 0.445 | 0.448 | 0.443 | 0.000 | 0.000 | 0.095 |
| 1300 | 0.445 | 0.446 | 0.450 | 0.443 | 0.000 | 0.000 | 0.108 |
| 1330 | 0.445 | 0.437 | 0.450 | 0.443 | 0.000 | 0.000 | 0.108 |
| 1400 | 0.445 | 0.441 | 0.450 | 0.443 | 0.000 | 0.000 | 0.103 |
| 1430 | 0.443 | 0.441 | 0.448 | 0.446 | 0.020 | 0.000 | 0.110 |
| 1500 | 0.443 | 0.439 | 0.448 | 0.446 | 0.000 | 0.000 | 0.110 |
| 1530 | 0.445 | 0.439 | 0.448 | 0.446 | 0.000 | 0.000 | 0.117 |
| 1600 | 0.445 | 0.439 | 0.448 | 0.446 | 0.000 | 0.000 | 0.115 |
| 1630 | 0.443 | 0.437 | 0.450 | 0.446 | 0.000 | 0.000 | 0.117 |
| 1700 | 0.439 | 0.439 | 0.448 | 0.445 | 0.000 | 0.000 | 0.146 |
| 1730 | 0.437 | 0.437 | 0.446 | 0.448 | 0.000 | 0.000 | 0.137 |
| 1800 | 0.437 | 0.437 | 0.446 | 0.448 | 0.000 | 0.000 | 0.119 |
| 1830 | 0.436 | 0.436 | 0.445 | 0.445 | 0.000 | 0.000 | 0.189 |
| 1900 | 0.434 | 0.436 | 0.443 | 0.443 | 0.000 | 0.000 | 0.430 |
| 1930 | 0.436 | 0.436 | 0.439 | 0.443 | 0.000 | 0.324 | 0.430 |
| 2000 | 0.436 | 0.437 | 0.439 | 0.441 | 0.000 | 0.437 | 0.432 |
| 2030 | 0.437 | 0.437 | 0.439 | 0.441 | 0.000 | 0.437 | 0.432 |
| 2100 | 0.439 | 0.439 | 0.441 | 0.443 | 0.000 | 0.441 | 0.434 |
| 2130 | 0.439 | 0.441 | 0.443 | 0.445 | 0.000 | 0.441 | 0.434 |
| 2200 | 0.443 | 0.443 | 0.448 | 0.443 | 0.000 | 0.441 | 0.436 |
| 2230 | 0.441 | 0.441 | 0.448 | 0.443 | 0.000 | 0.441 | 0.436 |
| 2300 | 0.443 | 0.441 | 0.445 | 0.443 | 0.279 | 0.443 | 0.436 |
| 2330 | 0.443 | 0.439 | 0.443 | 0.443 | 0.445 | 0.443 | 0.437 |
| 2400 | 0.446 | 0.443 | 0.443 | 0.443 | 0.446 | 0.445 | 0.439 |
| TOTAL KWH | 10.687 | 10.568 | 10.752 | 10.676 | 4.613 | 6.229 | 6.520 |

| GROUP NUMBER 09 | TEST PERIOD: 20 DAYS FROM 4/9/93 THRU 4/28/93 | DIVERSIFIED DEMANDS (TOTALIZED) | | KILOWATTS | | |
|-----------------|---|-----------------------------------|------------|------------|------------|-----------|
| TEST WEEK | START DATE | END DATE | START DATE | END DATE | START DATE | |
| START DATE | END DATE | START DATE | END DATE | START DATE | END DATE | |
| 0030 | 4/23/93 | 4/24/93 | 4/25/93 | 4/26/93 | 4/27/93 | 4/28/93 |
| 0100 | FRIDAY | FRIDAY | SUNDAY | MONDAY | TUESDAY | WEDNESDAY |
| 0130 | 0.439 | 0.448 | 0.452 | 0.446 | 0.454 | 0.452 |
| 0200 | 0.441 | 0.445 | 0.450 | 0.446 | 0.450 | 0.450 |
| 0230 | 0.443 | 0.445 | 0.450 | 0.448 | 0.450 | 0.452 |
| 0300 | 0.441 | 0.446 | 0.452 | 0.446 | 0.448 | 0.454 |
| 0330 | 0.441 | 0.445 | 0.454 | 0.450 | 0.450 | 0.452 |
| 0400 | 0.439 | 0.445 | 0.454 | 0.446 | 0.448 | 0.450 |
| 0430 | 0.437 | 0.445 | 0.452 | 0.445 | 0.448 | 0.448 |
| 0500 | 0.437 | 0.443 | 0.452 | 0.446 | 0.448 | 0.452 |
| 0530 | 0.439 | 0.445 | 0.452 | 0.450 | 0.452 | 0.450 |
| 0600 | 0.437 | 0.443 | 0.452 | 0.446 | 0.448 | 0.446 |
| 0630 | 0.437 | 0.443 | 0.450 | 0.446 | 0.448 | 0.446 |
| 0700 | 0.439 | 0.443 | 0.448 | 0.446 | 0.448 | 0.446 |
| 0730 | 0.445 | 0.445 | 0.452 | 0.454 | 0.452 | 0.445 |
| 0800 | 0.441 | 0.443 | 0.450 | 0.449 | 0.450 | 0.450 |
| 0830 | 0.443 | 0.443 | 0.452 | 0.449 | 0.450 | 0.452 |
| 0900 | 0.439 | 0.446 | 0.448 | 0.449 | 0.448 | 0.454 |
| 0930 | 0.439 | 0.446 | 0.448 | 0.449 | 0.448 | 0.454 |
| 1000 | 0.439 | 0.443 | 0.448 | 0.449 | 0.448 | 0.450 |
| 1030 | 0.443 | 0.446 | 0.450 | 0.449 | 0.448 | 0.450 |
| 1100 | 0.441 | 0.446 | 0.454 | 0.449 | 0.448 | 0.448 |
| 1130 | 0.445 | 0.443 | 0.452 | 0.449 | 0.450 | 0.448 |
| 1200 | 0.445 | 0.446 | 0.452 | 0.449 | 0.448 | 0.448 |
| 1230 | 0.443 | 0.443 | 0.452 | 0.449 | 0.448 | 0.448 |
| 1300 | 0.443 | 0.443 | 0.452 | 0.449 | 0.448 | 0.448 |
| 1330 | 0.445 | 0.443 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1400 | 0.445 | 0.443 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1430 | 0.441 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1500 | 0.437 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1530 | 0.437 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1600 | 0.437 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1630 | 0.439 | 0.448 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1700 | 0.437 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1730 | 0.441 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1800 | 0.439 | 0.446 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1830 | 0.439 | 0.445 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1900 | 0.436 | 0.443 | 0.450 | 0.449 | 0.448 | 0.448 |
| 1930 | 0.441 | 0.443 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2000 | 0.441 | 0.443 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2030 | 0.441 | 0.443 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2100 | 0.439 | 0.448 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2130 | 0.441 | 0.448 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2200 | 0.441 | 0.448 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2230 | 0.439 | 0.448 | 0.450 | 0.449 | 0.448 | 0.448 |
| 2300 | 0.445 | 0.452 | 0.452 | 0.449 | 0.448 | 0.448 |
| 2330 | 0.445 | 0.452 | 0.452 | 0.449 | 0.448 | 0.448 |
| 2400 | 0.448 | 0.450 | 0.445 | 0.449 | 0.448 | 0.448 |
| TOTAL KWH | 10.580 | 10.802 | 6.087 | 5.332 | 6.713 | 9.662 |

NO. 1 DUAL CUSTOMER LOAD CHARACTERISTICS
SERIAL NUMBER 99 CUSTOMER'S
EST. PERIOD: 20 DAYS FROM 4 9 93 THRU 4/28/93

MAXIMUM PERIOD (E...)
INTEGRATED ...

| CUSTOMER NUMBER | TOTAL USE KWH | LOAD FACTOR PERCENT | KILOWATTS | DATE | DAY | TIME ENDING |
|-----------------|---------------|---------------------|-----------|---------|-----|-------------|
| 92 9 | 454.932 | 14.5 | 6.546 | 4/27/93 | TUE | 2000 |

TEST PERIOD USE-TOTAL GROUP 454.932 KWH
TEST PERIOD USE-AVERAGE CUSTOMER 454.932 KWH

NONCOINCIDENT MAXIMUM DEMAND-TOTAL GROUP 6.546 KILOWATTS
NONCOINCIDENT MAXIMUM DEMAND-AVERAGE CUSTOMER 6.546 KILOWATTS

ANSEL KERNIN 220 DAVIS RD CHELTENHAM, PA 19012 TOTAL LOAD (E.S.T.)

| GROUP NUMBER | 99 | 1 | CUSTOMER | 4/9/93 | THRU | 4/28/93 | INTEGRATED LOAD | HALF-HOUR | TOTAL LOAD |
|--------------|--------|----------|----------|---------|---------|-----------|-----------------|-----------|------------|
| TEST PERIOD | 20 | DAYS | FROM | 4/9/93 | THRU | 4/28/93 | INTEGRATED LOAD | HALF-HOUR | TOTAL LOAD |
| TEST WEEK | 1 | DAYS | FROM | 4/9/93 | THRU | 4/28/93 | INTEGRATED LOAD | HALF-HOUR | TOTAL LOAD |
| INTERVAL | 4/9/93 | 4/10/93 | 4/11/93 | 4/12/93 | 4/13/93 | 4/14/93 | 4/15/93 | 4/16/93 | 4/17/93 |
| ENDING | EPIDAY | SATURDAY | SUNDAY | MONDAY | TUESDAY | WEDNESDAY | THURSDAY | | |
| 0040 | 1.262 | 1.379 | 1.235 | 0.896 | 1.153 | 1.249 | 3.654 | | |
| 0100 | 1.144 | 1.093 | 1.135 | 0.829 | 1.165 | 1.080 | 3.952 | | |
| 0130 | 0.859 | 0.784 | 0.917 | 0.790 | 0.932 | 0.776 | 1.226 | | |
| 0200 | 0.722 | 0.792 | 0.758 | 0.719 | 0.916 | 0.745 | 0.775 | | |
| 0230 | 0.701 | 0.701 | 0.773 | 0.707 | 0.862 | 0.672 | 0.702 | | |
| 0300 | 0.724 | 0.710 | 0.674 | 0.716 | 0.732 | 0.712 | 0.726 | | |
| 0330 | 0.805 | 0.680 | 0.799 | 0.872 | 0.738 | 0.658 | 0.690 | | |
| 0400 | 0.868 | 0.868 | 0.827 | 0.828 | 0.881 | 1.057 | 0.920 | | |
| 0430 | 0.936 | 0.868 | 0.733 | 0.710 | 0.964 | 1.031 | 1.154 | | |
| 0500 | 1.234 | 0.690 | 0.679 | 0.709 | 0.908 | 0.998 | 1.064 | | |
| 0530 | 0.928 | 0.691 | 0.686 | 0.684 | 0.941 | 0.974 | 1.072 | | |
| 0600 | 0.958 | 0.683 | 0.680 | 0.655 | 0.946 | 1.054 | 1.082 | | |
| 0630 | 1.055 | 0.784 | 0.644 | 0.655 | 0.740 | 0.992 | 0.868 | | |
| 0700 | 1.012 | 1.168 | 1.105 | 1.156 | 0.877 | 0.799 | 0.947 | | |
| 0730 | 0.798 | 0.887 | 0.880 | 0.926 | 0.812 | 0.676 | 0.816 | | |
| 0800 | 0.800 | 0.910 | 0.856 | 0.828 | 0.812 | 0.852 | 0.786 | | |
| 0830 | 0.917 | 0.806 | 0.772 | 0.780 | 0.688 | 0.714 | 0.906 | | |
| 0900 | 0.490 | 0.806 | 0.781 | 0.792 | 0.673 | 0.694 | 0.600 | | |
| 0930 | 0.354 | 0.808 | 0.917 | 0.803 | 0.573 | 0.658 | 0.331 | | |
| 1000 | 0.299 | 0.750 | 1.052 | 0.758 | 0.719 | 0.666 | 0.396 | | |
| 1030 | 0.286 | 0.797 | 0.805 | 0.996 | 0.731 | 0.679 | 0.355 | | |
| 1100 | 0.254 | 0.804 | 0.785 | 1.154 | 1.105 | 0.631 | 0.364 | | |
| 1130 | 0.254 | 0.804 | 0.878 | 1.019 | 1.105 | 0.631 | 0.364 | | |
| 1200 | 0.450 | 1.037 | 0.875 | 0.952 | 0.496 | 0.827 | 0.380 | | |
| 1230 | 0.552 | 1.139 | 1.010 | 1.000 | 0.350 | 0.737 | 0.538 | | |
| 1300 | 0.384 | 0.971 | 1.076 | 0.799 | 0.610 | 0.697 | 0.280 | | |
| 1330 | 0.432 | 1.018 | 0.781 | 0.745 | 0.310 | 0.667 | 0.300 | | |
| 1400 | 0.461 | 1.002 | 0.758 | 0.714 | 0.283 | 0.655 | 0.312 | | |
| 1430 | 0.396 | 0.852 | 0.746 | 0.817 | 0.253 | 0.659 | 0.259 | | |
| 1500 | 0.355 | 0.852 | 0.904 | 0.814 | 0.413 | 0.658 | 0.300 | | |
| 1530 | 0.396 | 0.919 | 0.880 | 0.826 | 0.556 | 0.658 | 0.421 | | |
| 1600 | 0.480 | 0.977 | 0.732 | 0.822 | 0.483 | 1.015 | 0.538 | | |
| 1630 | 0.739 | 0.949 | 0.754 | 0.867 | 0.799 | 1.145 | 0.538 | | |
| 1700 | 0.473 | 0.814 | 0.751 | 0.996 | 1.680 | 1.086 | 0.612 | | |
| 1730 | 0.565 | 0.814 | 0.728 | 1.116 | 1.414 | 1.057 | 0.462 | | |
| 1800 | 0.636 | 0.534 | 0.724 | 1.328 | 3.086 | 1.192 | 0.704 | | |
| 1830 | 0.898 | 0.538 | 0.784 | 1.328 | 5.491 | 1.283 | 0.704 | | |
| 1900 | 0.725 | 1.038 | 0.928 | 1.308 | 3.158 | 1.325 | 0.737 | | |
| 1930 | 0.674 | 1.038 | 0.882 | 1.408 | 1.206 | 1.454 | 0.910 | | |
| 2000 | 0.750 | 1.583 | 0.882 | 1.234 | 4.016 | 1.859 | 0.910 | | |
| 2030 | 0.881 | 1.378 | 0.757 | 1.202 | 2.077 | 1.430 | 1.445 | | |
| 2100 | 0.870 | 1.356 | 0.778 | 3.622 | 1.031 | 1.490 | 1.488 | | |
| 2130 | 0.725 | 1.324 | 0.779 | 1.420 | 1.312 | 1.312 | 1.488 | | |
| 2200 | 0.823 | 1.278 | 1.193 | 1.250 | 3.060 | 1.235 | 1.235 | | |
| 2230 | 0.791 | 1.230 | 1.193 | 1.222 | 2.506 | 1.235 | 1.157 | | |
| 2300 | 0.757 | 1.586 | 1.374 | 1.224 | 1.164 | 1.236 | 1.157 | | |
| 2330 | 0.760 | 2.240 | 1.438 | 1.270 | 1.052 | 1.192 | 1.211 | | |
| 2400 | 1.034 | 2.083 | 1.246 | 1.270 | 1.052 | 1.192 | 1.211 | | |
| TOTAL KWH | 16,913 | 24,248 | 21,002 | 23,714 | 31,138 | 22,691 | 20,687 | | |

74.121 KERVIN 122 DENVER RD. CHELLENHAM, PA. 19012 TOTAL LOAD (E.S.T.)

| GROUP NUMBER | LOAD CHARACTERISTICS | INTEGRATED CLOCK HALF-HOUR | | | | | | |
|--------------|----------------------------------|---------------------------------|----------|---------|---------|---------|-----------|----------|
| | | 4/16/93 | 4/17/93 | 4/18/93 | 4/19/93 | 4/20/93 | 4/21/93 | 4/22/93 |
| TEST PERIOD | 20 DAYS FROM 4/9/93 THRU 4/28/93 | DIVERSIFIED DEMANDS (TOTALIZED) | | | | | | |
| TEST WEEK | 2 | FRIDAY | SATURDAY | SUNDAY | MONDAY | TUESDAY | WEDNESDAY | THURSDAY |
| INTERVAL | ENDING | KILOWATTS | | | | | | |
| 0030 | 1.196 | 1.339 | 1.302 | 1.865 | 1.001 | 1.231 | 1.117 | 1.183 |
| 0100 | 1.075 | 1.242 | 1.319 | 1.608 | 0.840 | 1.004 | 1.004 | 0.887 |
| 0130 | 0.870 | 1.095 | 1.205 | 0.974 | 0.787 | 0.792 | 0.792 | 0.754 |
| 0200 | 0.938 | 0.772 | 0.845 | 0.851 | 0.812 | 0.732 | 0.732 | 0.685 |
| 0230 | 0.904 | 0.793 | 0.818 | 0.739 | 0.846 | 0.846 | 0.811 | 0.658 |
| 0300 | 0.704 | 0.860 | 0.942 | 0.704 | 0.667 | 0.667 | 0.784 | 0.671 |
| 0330 | 0.703 | 0.785 | 0.785 | 0.698 | 0.701 | 0.658 | 0.664 | 0.626 |
| 0400 | 0.694 | 0.674 | 0.674 | 0.685 | 0.683 | 0.683 | 0.668 | 0.808 |
| 0430 | 0.925 | 0.667 | 0.726 | 0.708 | 1.100 | 1.100 | 1.340 | 0.718 |
| 0500 | 0.925 | 0.703 | 0.703 | 1.061 | 0.866 | 0.949 | 0.949 | 0.839 |
| 0530 | 0.908 | 0.703 | 0.722 | 1.001 | 0.940 | 0.940 | 0.980 | 0.572 |
| 0600 | 1.050 | 0.656 | 0.733 | 1.084 | 1.192 | 1.070 | 1.070 | 0.706 |
| 0630 | 1.244 | 0.641 | 0.691 | 1.034 | 1.084 | 1.085 | 1.085 | 0.590 |
| 0700 | 1.032 | 1.205 | 1.234 | 0.785 | 0.808 | 0.962 | 0.962 | 0.373 |
| 0730 | 0.730 | 0.803 | 0.863 | 0.785 | 0.713 | 0.704 | 0.704 | 0.373 |
| 0800 | 0.673 | 0.751 | 0.769 | 0.730 | 0.708 | 0.752 | 0.752 | 0.533 |
| 0830 | 0.776 | 0.774 | 0.773 | 0.758 | 0.708 | 0.752 | 0.752 | 0.444 |
| 0900 | 0.716 | 0.736 | 0.736 | 0.707 | 0.694 | 0.376 | 0.376 | 0.444 |
| 0930 | 0.690 | 0.776 | 0.776 | 0.762 | 0.593 | 0.260 | 0.260 | 0.403 |
| 1000 | 0.816 | 0.822 | 0.811 | 0.810 | 0.474 | 0.254 | 0.254 | 0.403 |
| 1030 | 0.929 | 0.817 | 0.880 | 0.756 | 0.935 | 0.323 | 0.323 | 0.349 |
| 1100 | 0.914 | 1.232 | 1.026 | 0.671 | 0.463 | 0.475 | 0.475 | 0.329 |
| 1130 | 0.730 | 1.098 | 0.904 | 0.668 | 0.517 | 0.475 | 0.475 | 0.272 |
| 1200 | 0.688 | 1.502 | 0.739 | 0.794 | 0.468 | 0.391 | 0.391 | 0.326 |
| 1230 | 0.695 | 1.313 | 0.774 | 0.763 | 0.468 | 0.232 | 0.232 | 0.434 |
| 1300 | 0.726 | 0.869 | 0.775 | 0.716 | 0.500 | 0.265 | 0.265 | 0.476 |
| 1330 | 0.688 | 0.785 | 0.907 | 0.690 | 0.482 | 0.276 | 0.276 | 0.476 |
| 1400 | 0.704 | 0.799 | 0.830 | 0.857 | 0.533 | 0.229 | 0.229 | 0.340 |
| 1430 | 0.809 | 0.839 | 1.032 | 0.746 | 0.478 | 0.277 | 0.277 | 0.289 |
| 1500 | 0.829 | 0.905 | 0.952 | 0.680 | 0.632 | 0.276 | 0.276 | 0.348 |
| 1530 | 0.752 | 0.925 | 0.845 | 0.688 | 0.560 | 0.276 | 0.276 | 0.286 |
| 1600 | 0.684 | 0.817 | 0.827 | 0.653 | 0.508 | 0.343 | 0.343 | 0.341 |
| 1630 | 0.766 | 0.808 | 0.739 | 0.692 | 0.587 | 0.305 | 0.305 | 0.389 |
| 1700 | 0.697 | 1.201 | 0.810 | 0.748 | 0.539 | 0.364 | 0.364 | 0.752 |
| 1730 | 1.378 | 0.853 | 0.770 | 0.989 | 0.606 | 0.364 | 0.364 | 0.842 |
| 1800 | 2.227 | 0.962 | 0.978 | 0.989 | 0.612 | 0.364 | 0.364 | 0.752 |
| 1830 | 2.018 | 1.144 | 1.035 | 1.312 | 0.900 | 0.979 | 0.979 | 0.898 |
| 1900 | 1.384 | 1.266 | 1.187 | 1.004 | 0.996 | 1.200 | 1.200 | 0.899 |
| 1930 | 1.156 | 5.244 | 1.264 | 1.043 | 4.190 | 1.342 | 1.342 | 0.929 |
| 2000 | 1.026 | 3.431 | 1.218 | 1.090 | 2.635 | 1.327 | 1.327 | 1.003 |
| 2030 | 1.056 | 1.178 | 1.300 | 1.067 | 4.303 | 1.248 | 1.248 | 1.082 |
| 2100 | 1.194 | 1.237 | 1.220 | 1.002 | 2.345 | 1.130 | 1.130 | 1.109 |
| 2130 | 1.268 | 1.344 | 1.295 | 1.168 | 1.003 | 1.132 | 1.132 | 1.252 |
| 2200 | 1.278 | 1.402 | 1.356 | 1.279 | 1.310 | 1.110 | 1.110 | 1.256 |
| 2230 | 1.456 | 1.403 | 1.229 | 1.088 | 1.399 | 1.079 | 1.079 | 1.226 |
| 2300 | 1.559 | 1.633 | 1.259 | 0.965 | 1.228 | 0.992 | 0.992 | 1.166 |
| 2330 | 1.466 | 1.510 | 1.142 | 0.968 | 1.228 | 0.992 | 0.992 | 1.166 |
| 2400 | 1.303 | 1.542 | 1.273 | 0.968 | 1.228 | 0.992 | 0.992 | 1.166 |
| TOTAL KWH | 23,992 | 27,424 | 23,332 | 21,725 | 25,893 | 17,491 | 17,491 | 16,604 |

PECO

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COST ESTIMATE Residential Electric Service

DOCUMENT FOLDER

Customer Number

Customer Rep: JUN 01 1993
 Customer Name: Daniel J. P...
 Division Office: _____
 Refer to Customer # for all inquiries. Customer # appears on the monthly bill.
 Bill Estimate (1 month): \$

SECRETARY'S BUREAU Information Control Division Typical Household Services

| Appliance and Period of Use | Avg. Watts | Average One Month KWH | Adjusted For Your Family | Appliance and Period of Use | Avg. Watts | Average One Month KWH | Adjusted For Your Family |
|---|--|--|--------------------------|--|---|--|--------------------------|
| Lighting (Winter months) <input type="checkbox"/> 4 - 5 Rooms <input checked="" type="checkbox"/> 6 - 8 Rooms <input type="checkbox"/> 8 - 12 Rooms <input type="checkbox"/> Outdoor Floodlight | 214 | 71 | 60 | Laundry Service (Hrs./week) <input checked="" type="checkbox"/> Washer, automatic (4) <input checked="" type="checkbox"/> Dryer 3 hrs / 59 hrs (4) <input type="checkbox"/> Iron | 512 4,866 1,100 | 8 77 18 | 4 18 - 55 |
| Television, Radio and Stereo (Hrs./day) <input type="checkbox"/> Television, color (tube type) (8) <input checked="" type="checkbox"/> Television, color (solid state) (8) <input type="checkbox"/> Television, B & W (tube type) (8) <input type="checkbox"/> Television, B & W (solid state) (8) <input type="checkbox"/> Radio (tube type) (3) <input type="checkbox"/> Radio (solid state) (3) <input type="checkbox"/> Radio/Record Player (3) <input type="checkbox"/> Stereo set, portable (4) <input type="checkbox"/> Stereo set, large console (4) | 300 200 160 55 71 25 109 42 208 | 72 48 38 12 6 2 10 5 25 | 40 | Water Heating: (More than any other electric service, water heating is affected by the size of a family and the habits and ages of its members. The following formula attempts to recognize such variables.) <input type="checkbox"/> For one adult <input type="checkbox"/> Infants up to 18 months of age <input type="checkbox"/> Add for each additional adult or child | 4,474 | 250 125 75 | |
| Refrigeration <input type="checkbox"/> Refrig.-Freezer (Man. Defrost) 14 cu. ft. <input type="checkbox"/> Refrig.-Freezer (Part. Defrost) 14 cu. ft. <input type="checkbox"/> Refrig. Freezer (Auto. Defrost) 14 cu. ft. <input type="checkbox"/> Refrig.-Freezer (Side by Side) <input type="checkbox"/> Freezer (Man. Defrost) 15 cu. ft. <input type="checkbox"/> Freezer (Auto. Defrost) 15 cu. ft. | 326 505 615 750 341 440 | 100 160 200 300 100 150 | 150 200 | Heating, Air Conditioning and Ventilation Heating plant, in peak season <input type="checkbox"/> Room Heater (2 hrs./day) <input type="checkbox"/> Quartz Heater (10 hrs./day) <input type="checkbox"/> Oil Burner or Stoker Motor (Peak) <input checked="" type="checkbox"/> Furnace Fan, air system (Peak) <input type="checkbox"/> Circulator, water system (Peak) <input type="checkbox"/> *Air Conditioner (Window) 12,000 BTU/Hr. (1 Ton, 8 hrs./day) <input type="checkbox"/> *Air Conditioner (Central) 36,000 BTU/Hr. (3 Tons, 12 hrs./day) <input type="checkbox"/> Window Fan (Peak) <input type="checkbox"/> Desk Type Fan (Peak) <input type="checkbox"/> Kitchen Exhaust Fan <input type="checkbox"/> Dehumidifier (Peak) <input type="checkbox"/> Humidifier (Peak) <input type="checkbox"/> Attic Fan (Peak) | 1,300 1,500 266 400 250 1,500 4,500 171 88 88 525 177 370 | 78 450 64 240 150 360 1,600 30 7 5 300 35 48 | 240 265 |
| Cooking <input type="checkbox"/> Range <input type="checkbox"/> Microwave Oven (Based on full use) <input type="checkbox"/> Roastor (3 Hrs./week) <input type="checkbox"/> Deep Fat Fryer (1 Hr./week) <input type="checkbox"/> Fry Pan (3 Hrs./week) <input type="checkbox"/> Broiler or Rotisserie (1.5 Hrs./wk) <input type="checkbox"/> Toaster (1 Hr./week) <input type="checkbox"/> Sandwich Grill or Hot Plate (1 Hr./wk) <input type="checkbox"/> Coffee Maker (2 Hrs./week) <input checked="" type="checkbox"/> Drip Coffee Maker (1 Hr./day) <input type="checkbox"/> Slow Cooker | 12,200 1,500 1,333 1,448 1,196 1,436 1,146 1,161 894 1,400 175 | 150 40 16 6 14 8 2 2 7 38 11 | 10 38 | Other Services <input checked="" type="checkbox"/> Dishwasher with heater (2 cycles/day) <input type="checkbox"/> Bed Covering (Peak) <input type="checkbox"/> Hair Dryer (15 min./day) <input type="checkbox"/> Water Pump <input type="checkbox"/> Shallow <input type="checkbox"/> Deep <input type="checkbox"/> Lawn Mower (Peak) <input type="checkbox"/> Vacuum Cleaner (3 Hrs./week) <input type="checkbox"/> Swim Pool circ pump & filter system Above-ground or in-ground pools @ 24 hrs./day <input type="checkbox"/> Heating Cable 10 / ft. <input type="checkbox"/> Water Bed Heater 360 (Thermostat cycle 10 Hrs./day in cool weather) | 1,200 177 1,500 1,060 1,736 780 630 575 360 | 48 24 10 30 60 5 7 410 108 | |
| Miscellaneous Appliances: (Multiply 2 KWH times each check) <input type="checkbox"/> Blender <input type="checkbox"/> Bottle Warmer <input type="checkbox"/> Can Opener <input type="checkbox"/> Egg Cooker <input type="checkbox"/> Food Mixer <input type="checkbox"/> Ice Cream Freezer <input type="checkbox"/> Juicer <input type="checkbox"/> Knife Sharpener <input type="checkbox"/> Sauce Pan <input type="checkbox"/> Waffle Iron <input checked="" type="checkbox"/> Clock <input type="checkbox"/> Warming Tray <input type="checkbox"/> Waste Disposal <input type="checkbox"/> Heat Lamp <input type="checkbox"/> Heating Pad <input type="checkbox"/> Razor <input type="checkbox"/> Tooth Brush <input type="checkbox"/> Vibrator <input checked="" type="checkbox"/> Floor Polisher <input type="checkbox"/> Sewing Machine <input type="checkbox"/> Sun Lamp <input type="checkbox"/> Tape Recorder <input type="checkbox"/> Workshop Equip. | | | 10 | + (plus) KWH Subtotal (Column B) | | 262 | 520 |

KWH Subtotal (Column A): 498
 Total monthly KWH estimate: 760

How to Estimate Your Electric Service Bill

- Identify the appliances you use in your home.
- The table shows monthly KWH usage for specific appliances. It lists average power in watts and total consumption in KWH.
- Size of family, appliances and living habits affect electric use. Adjust the "Average One Month KWH" for each appliance on the table according to your family size and use of those appliances.
- More precise figures can be obtained by substituting watt ratings of your appliances and the monthly usage for those appliances. (Watt ratings are usually indicated on the specification label.)
 Example: 75 watt bulb used 60 hours. (2 hours per day)
 75 watts X 60 hours = 4,500 Watt Hours
 4,500 ÷ 1,000 = 4.5 KWH
- Enter estimated KWH amount for each appliance in the right-hand columns. Add the entries to obtain your 1 month KWH use.
- Your average cost per KWH is determined by dividing your total bill (include all charges) by the KWH used.
 Example: \$59.59 ÷ 750 KWH = \$0.079 or 8.0c
- To estimate the cost per month for a particular appliance, multiply KWH times your average cost per KWH.
 Example: 4.5 KWH X \$0.080 = \$0.36

Handwritten calculations:
 379 + 498 = 877
 Philadelphia F-00160324
 JUN 14 1993
 PHOENIX A.I.

PHILADELPHIA ELECTRIC COMPANY

REPORT COPY

198-23124 REV. 6-89
METER SERIAL **9-4217743**

| | | | | | | | | | | |
|-----|----------|-------|---------------------------|-----------|------------------|----|----|--------|---------|-------------|
| SEO | PRIORITY | EQUIP | TEST DATE | TEST TYPE | AVERAGE AS FOUND | | | REPORT | # CALLS | MOTOR |
| | 270 | 11 | MO DAY YR 4 5 2 9 19 2 | 4 | FL | IL | LL | 110 | 11 | 197.8 / 116 |

ACCOUNT NO **40-19-10-21311**
 CUS* NAME **DANIEL J KERWIN**
 ADDRESS **122 DEWEY RD**

ELEC. SERVICE METER CONSTANT
 CAS

CP SWITCH OR REGISTER WITH THIS METER
 FOUND
 CHANGED

POST OFFICE **CHELTENHAM**

QUAD POLE KEY-MAIL
 TYPE DIALS CONSTANT LOC MOTOR
D5 5 0 00

DEMAND METER _____ CONSTANT _____

TEST BY: **WIN** TIME **PM** STANDARD **11:15**

| | | | |
|-------|-------------|------------|---|
| SEALS | FOUND | LEFT | BATTERY CHANGE <input type="checkbox"/> CALENDAR CHANGE <input type="checkbox"/> |
| WHM | 24 | 204 | |
| SC | | | |
| CO | 7374 | 702 | |

CUSTOMER RECORD CHECKED _____ 15 BY _____
 IND BILLING CHECKED _____ 19 BY _____

CT _____ PT _____ CONTACTS _____

| WITHOUT COMP | | | | | | WITH COMP | | | | CPCT | BALANCE TEST | | | | | | DIALS | FOUND | LEFT | | | |
|--------------|----|------|---------|----|----|-------------|----|------|----|------|--------------|-------|----|----|----|----|-------|-------|----------|----|----|----|
| SERIES TEST | | | | | | SERIES TEST | | | | | CUL | FOUND | | | | | | WHM | 07569000 | SD | CO | TD |
| AS FOUND | | | AS LEFT | | | FOUND | | LEFT | | EL | | FL | | IL | | FL | | | | | | |
| FL | IL | LL | FL | IL | LL | FL | LL | FL | LL | | | FL | IL | FL | IL | FL | IL | FL | IL | | | |
| 100.0 | | 97.1 | | | | | | | | | | | | | | | | | | | | |
| 100.0 | | 77.1 | | | | | | | | | | | | | | | | | | | | |
| | | | | | | AVE | | | | | | | | | | | | | | | | |

REMARKS: **PH16" HBC" FOUND 1st KW DIAL 1/10 SLOW, THIRD KW DIAL SLOW 4 5th KW DIAL FAST. CHG TO 9-4225534**
PL=1.1KW

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 JUN 14 1993

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SECRETARY'S BUREAU
 Information Control Division

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F-00160324
 Philadelphia
 11/19/93 PLO 8 A.I.

156-23124 REV 6-89

| | | | | | | | | | | | |
|--------------|-----|----------|-------|-----------------------|-----------|------------------|----|----|--------|---------|-----|
| METER SERIAL | SEO | PRIORITY | EQUIP | TEST DATE | TEST TYPE | AVERAGE AS FOUND | | | REPORT | # CALLS | MOT |
| 7-4925534 | 1 | 270 | 11 | MO DAY YR 6 7 1992 | 4 | FL | IL | LL | 110 | 1 | |

ACCOUNT NO 40-17-10-52151
 CUST NAME [unclear]
 ADDRESS [unclear]
 ELEC
 GAS SERVICE METER CONSTANT _____
 DEMAND METER _____ CONSTANT _____

OP SWITCH OR REGISTER WITH THIS METER
 FOUND
 CHANGED
 POST OFFICE QUAD POLE KEY-MAIL
 [unclear]
 TYPE DIALS CONSTANT LOC MOTOR
 15 5 [unclear] 010

TEST BY [unclear] TIME STANDARD-1 2 3 4
 CUSTOMER RECORD CHECKED _____ 19 BY _____
 IND BILLING CHECKED _____ 19 BY _____

| | | | |
|-------|-------|------|---|
| SEALS | FOUND | LEFT | BATTERY CHANGE <input type="checkbox"/> CALENDAR CHANGE <input type="checkbox"/> |
| WHM | | | |
| SC | | | |
| CO | | | |
| DEM | | | |

CT PT CCCONTACTS

| WITHOUT COMP | | | | | | WITH COMP | | | | CPCT | BALANCE TEST | | | | DIALS | FOUND | LEFT |
|--------------|----|----|---------|----|----|-------------|----|------|----|------|--------------|----|------|----|-------|-------|------|
| SERIES TEST | | | | | | SERIES TEST | | | | | | | | | | | |
| AS FOUND | | | AS LEFT | | | FOUND | | LEFT | | CUL | FOUND | | LEFT | | | | |
| FL | IL | LL | FL | IL | LL | FL | LL | FL | LL | | EL | FL | L | FL | IL | | |
| 110 | | | 77 | 77 | 77 | | | | | | T | | | | | | |
| 110 | | | 77 | 77 | 77 | | | | | | M | | | | | | |
| | | | | | | | | | | | B | | | | | | |
| AVE | | | | | | | | | | | | | | | | | |

REMARKS [unclear]

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 Philadelphia
 5/10/93 PECO A.I.

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STATEMENT OF ACCOUNT

ACCOUNT # 40-19-10-821511
DOCKET# F-00160324

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DOCKETED
JUN 14 1993

DANIEL J. KERWIN
122 DEWEY ROAD
CHELTENHAM, PA 19012

SECRETARY'S BUREAU
Information Control Division

| FROM | TO | KWH'S | REVENUE |
|----------|----------|-------|------------------|
| 4/04/91 | 5/21/91 | 450 | 67.81 |
| 5/21/91 | 6/03/91 | 457 | 65.68 |
| 6/03/91 | 7/02/91 | 791 | 118.82 |
| 7/02/91 | 7/31/91 | 1065 | 161.53 |
| 7/31/91 | 8/28/91 | 2264 | CANCELLED 350.52 |
| 7/31/91 | 9/26/91 | 2598 | 405.00 |
| 9/26/91 | 10/25/91 | 723 | 108.27 |
| 10/25/91 | 11/25/91 | 855 | 126.32 |
| 11/25/91 | 12/27/91 | 989 | 145.30 |
| 12/27/91 | 1/29/92 | 958 | 140.91 |
| 1/29/92 | 2/28/92 | 750 | 111.46 |
| 2/28/92 | 3/30/92 | 749 | 111.32 |
| 3/30/92 | 4/28/92 | 433 | 64.73 |
| 4/28/92 | 5/28/92 | 807 | 116.05 |
| 5/28/92 | 6/26/92 | 901 | 135.90 |
| 6/26/92 | 7/29/92 | 1546 | 237.83 |
| 7/29/92 | 8/26/92 | 1144 | 174.82 |
| 8/26/92 | 9/25/92 | 973 | 148.01 |
| 9/25/92 | 10/27/92 | 824 | 119.25 |
| 10/27/92 | 11/30/92 | 945 | 135.00 |
| 11/30/92 | 12/30/92 | 970 | 138.44 |
| 12/30/92 | 1/29/93 | 857 | 117.25 |
| 1/29/93 | 3/01/93 | 769 | 105.56 |
| 3/01/93 | 3/29/93 | 694 | 95.71 |
| 3/29/93 | 4/28/93 | 715 | 95.72 |

II. GAS HEAT BILLING

| FROM | TO | CCF'S | REVENUE |
|---------|---------|-------|---------|
| 4/03/93 | 5/21/91 | 83 | 65.63 |
| 5/21/91 | 6/03/91 | 18 | 14.62 |

F-00160324
Philadelphia

PELO 10
A.I.
5/10/93

GAS HEAT BILLING CONT.

| FROM | TO | CCF'S | REVENUE |
|----------|----------|--------------|---------|
| 6/03/91 | 7/02/91 | 28 | 25.58 |
| 7/02/91 | 7/31/91 | 27 | 24.95 |
| 7/31/91 | 8/27/91 | 22 CANCELLED | 20.77 |
| 7/31/91 | 9/26/91 | 51 | 47.30 |
| 9/26/91 | 10/25/91 | 73 | 55.87 |
| 10/25/91 | 11/25/91 | 147 | 104.75 |
| 11/25/91 | 12/27/91 | 162 | 105.78 |
| 12/27/91 | 1/29/92 | 244 | 153.06 |
| 1/29/92 | 2/28/92 | 208 | 131.61 |
| 2/28/92 | 3/30/92 | 206 | 130.42 |
| 3/30/92 | 4/28/92 | 113 | 74.48 |
| 4/28/92 | 5/28/92 | 60 E | 43.11 |
| 5/28/92 | 6/26/92 | 32 E | 26.55 |
| 6/26/92 | 7/29/92 | 31 | 25.95 |
| 7/29/92 | 8/26/92 | 27 E | 23.59 |
| 8/26/92 | 9/25/92 | 26 | 22.99 |
| 9/25/92 | 10/27/92 | 94 E | 63.24 |
| 10/27/92 | 11/30/92 | 173 E | 109.99 |
| 11/30/92 | 12/30/92 | 226 | 139.98 |
| 12/30/92 | 1/29/93 | 196 E | 122.41 |
| 1/29/93 | 3/01/93 | 254 E | 156.39 |
| 3/01/93 | 3/29/93 | 222 E | 137.12 |
| 3/29/93 | 4/28/93 | 105 E | 68.58 |

III. PAYMENTS

| DATE | AMOUNT |
|----------|-------------------------|
| 4/23/91 | \$250.00 |
| 5/20/91 | 300.00 |
| 6/14/91 | 268.07 |
| 7/26/91 | 130.82 |
| 10/18/91 | CREDIT ADJUSTMENT 78.95 |
| 10/18/91 | 300.00 |
| 1/07/92 | 300.00 |
| 2/18/92 | 183.70 |
| 5/15/92 | 300.00 |
| 6/10/92 | CREDIT ADJUSTMENT 80.49 |
| 10/16/92 | 211.00 |

IV. ACCOUNT SUMMARY

| | |
|---|------------|
| BALANCE PRIOR TO 4/04/91 | \$1,182.48 |
| TOTAL GAS BILLING 4/3/91 TO 4/28/93 | 1,873.95 |
| TOTAL ELECTRIC BILLING 4/4/91 TO 4/28/93 | 3,246.69 |
| TOTAL FINANCE CHARGES | 83.97 |
| TOTAL BILLING | 6,387.09 |
| TOTAL PAYMENTS 4/23/91 TO 10/16/92 | 2,403.03 |
| ACCOUNT BALANCE | 3,984.06 |

V. PAYMENT TERMS

10/10/91 MONTHLY PAYMENT TERMS
BALANCE: \$886.84
\$40.00 PLUS THE CURRENT BILL

12/10/92 B.C.S. DECISION
BALANCE: \$2,528.90
\$50.00 A MONTH PLUS THE BUDGET

CKB/gk



COMMONWEALTH OF PENNSYLVANIA
PENNSYLVANIA PUBLIC UTILITY COMMISSION
P.O. BOX 3265, HARRISBURG, PA. 17105-3265

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BCS NO: 0160324

JUN 01 1993

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DEC 09 1992

Daniel J. Kerwin
122 Dewey Road
Melrose Park PA 19012

SECRETARY'S BUREAU
Information Control Division

CONSUMER SERVICES

Dear Mr. Kerwin:

The Bureau of Consumer Services (BCS) has completed its investigation into your complaint. Attached is the Bureau's decision resulting from that investigation. Unless you appeal this decision, you are obligated to keep the terms of the decision.

Anyone involved with this complaint may appeal this decision. If you want to appeal you must request a formal hearing. You can do this by filling in the Request for Appeal form on the last page of this letter. You must return this form to the Pennsylvania Public Utility Commission by the appeal date shown on the Request for Appeal form. If you return this form after the appeal date, your appeal may be dismissed by the Commission unless you can demonstrate a good cause for filing late.

You do not need a lawyer to file an appeal.

Please remember that you must pay your current bills for utility service even if you file an appeal.

Very truly yours,

Eva B. Edelstein
Utility Complaint Investigator

Enclosure

cc: A. Cartwright, PECO

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JUN 14 1993

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F-00160324
Philadelphia

PELO 11
5/10/93 A.I.

BEFORE THE PENNSYLVANIA PUBLIC UTILITY COMMISSION

Daniel J. Kerwin
122 Beacy Road
Malrose Park PA 19012

V.

Philadelphia Electric Company

14
Date December 15, 1992

ICU No. 0160324

Acct. No. 45 19 10 821511

DECISION ON INFORMAL COMPLAINT BY THE BUREAU OF CONSUMER SERVICES:

STATEMENT OF COMPLAINT:

The above-captioned informal complaint was received by the Bureau of Consumer Services on 7-8-92 from Daniel J. Kerwin. In the complaint it was alleged that: he disputes the bills since August, 1991 at which time the company changed the meter. Bills have doubled since the meter was changed.

INVESTIGATION BY STAFF OF THE BUREAU OF CONSUMER SERVICES REVEALED:

1. That meter #6-299007 was changed on 8-26-91 and tested on 9-4-91. The meter tested within Public Utility Commission guidelines for registration accuracy.
2. That meter #9-4217743 was changed on 5-29-92. When it was tested it was found that the dials were out of sync. However, this does not affect the accuracy of the meter.
3. That Meter #9-4225534 was installed on 5-29-92. The meter was tested on 7-2-92. The meter tested within Public Utility Commission guidelines for registration accuracy.
4. That an analysis of the average daily kilowatt hour consumption for the past 4 years is shown on the attached chart.
5. That the current bill, due 12-23-92, is \$244.90. The account balance is \$2,806.90. The budget amount is \$228.00 and is subject to change.

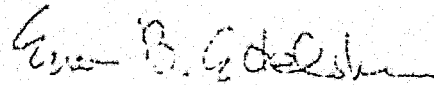
BASED ON THESE FINDINGS, THE BUREAU OF CONSUMER SERVICES CONCLUDES THAT:

1. The account has been billed for actual registration on all three meters.
2. Bills are correct as rendered.

THEREFORE, IT IS DECIDED:

1. That the informal complaint of Daniel J. Kerwin is dismissed.
2. That Daniel J. Kerwin shall pay beginning with the December, 1992 due date, the budget amount of \$228.00 by the due date monthly PLUS \$50.00 monthly toward the arrearage until the balance is paid in full.
3. That the utility shall not apply late payment charges to the customer's account while the terms of this decision are in effect. However, the utility may apply late payment charges to any amounts that are not paid on time under the terms and conditions of this agreement.

Copies of this decision will be issued to all participants in the complaint. Any questions concerning the terms of this decision or concerning the Public Utility Commission's appeal procedures may be directed to the Bureau of Consumer Services at 1-800-782-1110.



Eva B. Edelstein

Utility Complaint Investigator
Bureau of Consumer Services
PA Public Utility Commission

REQUEST FOR APPEAL FROM CONSUMER SERVICE DECISION

Please send me formal complaint forms at the address listed below.

0160324

BCS NUMBER

DATE OF MAILING

COMPANY NAME:

Philadelphia Electric Company

SIGNATURE

CUSTOMER NAME AND ADDRESS

(Please correct any mistakes
in your name and address)

Daniel J. Kerwin
122 Dawey Road
Melrose Park PA 19012

AREA CODE TELEPHONE NO.

Mail this completed form to: Secretary
PA Public Utility Commission
P.O. Box 3265
Harrisburg, Pa. 17105-3265

TO APPEAL THIS DECISION, RETURN THIS FORM BY:

1/4/93
~~December 30, 1992~~
APPEAL DATE

DATE May 27, 1993

SUBJECT Late-filed Exhibits
(Kerwin v. Philadelphia Electric Company, F-00160324)

TO File Room

FROM Ky Van Nguyen *Ky*
Administrative Law Judge

With this memorandum, I send to you a copy of a late-filed exhibit in the above case.

5-10-93 Ky.

KVN:kn

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JUN 02 1993

Office of A. L. J.
Public Utility Commission

SECRET/PRV'S BUREAU
Information Control Division

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JUN 02 1993

The Honorable Ky Van Nguyen

Administrative Law Judge

Penna. Public Utility Comm.

Philadelphia, Court 1302

DOCKETED

JUN 14 1993

Saturday, May 15, 1993

122 Dewey Road

Cheltenham, Pa 19012

Sir,

DOC.# F-00160324 Kerwin vs. PECO

sorry to report that we are unable to locate any PECO bills for 1987 or 1988. The best (most recent) we can find are from 1982. During 1982, all four of our children were living at home, with myself, Mrs. Kerwin and her Father, John, who passed away during 1990.

You may note (below) that bills from 1982, with seven people using the electric utility --- includes stereos, hair dryers and extra Televisions and radios, the electricity consumed was almost as bad as what PECO is billing just two people --- myself and Mrs. K./91+92.

| 1982 | Months | 1989 | 1990 | 1991 | 1992 |
|---|------------|-------------------|-------------------|-------------------|---------------------------------|
| 733 | May-Jun. | 330 | 301 | 686 ^y | 807 |
| 930 | Jun-Jul. | 610 | 958 | 791 | 1546 |
| 1878 | Jul-Aug. | 894 | 574 | 1065 | 1144 |
| 1255 | Aug-Sep. | 848 | 797 | 2264 | 973 |
| 970 | Sep-Oct. | 707 | 407 | 334 | 824 |
| 805 | Oct-Nov. | 317 | 387 | 727 | 945 |
| | Nov-Dec. | 303 | 314 | 855 | 970 |
| | Dec-Jan. | 612 | 477 | 989 | 857 |
| ⁸³ 970 | Jan-Feb. | ⁹⁰ 308 | ⁹¹ 353 | ⁹² 958 | ⁹³ — |
| | Feb-Mar. | 278 | 284 | 750 | |
| 817 | Mar-Apr. | 230 | 278 | 749 | |
| 902 | Apr-May | 255 | 221 | 433 | |
| <u>9260</u> ⁹ / ₁₁₀ | Totals | 5962 | 5351 | 10,661 | |
| 1025 | ←Mo.-Avg.→ | 497 | 446 | 883.4 | ⁸⁰⁰ / ₉₉₆ |

new meter =

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PUBLIC UTILITY COMMISSION
PHILADELPHIA, PA
MAY 15 1993

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THANK YOU,

Harold J. Kerwin
Daniel J. Kerwin

883.4