# **DOCKET SECTION**

BEFORE THE RECEIVED POSTAL RATE COMMISSION WASHINGTON, D.C. 20268-0004NH 27 11 50 Mil '38

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Postal Rate and Fee Changes, 1997 )

Docket No. R97-1

### ANSWERS OF THE OFFICE OF THE CONSUMER ADVOCATE TO INTERROGATORIES OF UNITED STATES POSTAL SERVICE WITNESS: PAMELA A. THOMPSON (USPS/OCA-T100-11-23) (JANUARY 27, 1998)

The Office of the Consumer Advocate hereby submits the answers of Pamela A.

Thompson to interrogatories USPS/OCA-T100-11-23, dated January 13, 1998. Each

interrogatory is stated verbatim and is followed by the response.

Respectfully submitted,

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KENNETH E. RICHARDSON Attorney Office of the Consumer Advocate

USPS/OCA-T100-11. Please refer to OCA-LR-4; the narrative on pages 25 and 26 of OCA-LR-4 discusses the PESSA cost factors, including the citation, to USPS-T-5, Workpaper A-1 at 138-140.1.

(a) Please confirm that on both pages 25 and 26, component number 572 is defined as the Postal Service's "total rental value" factor.

(b) Please confirm that on pages 137-138.1 of USPS-T-5, Workpaper A-I, component number 562 is defined as the Postal Service's "Total Rental Value".

(c) Is 572 or 562 the correct component number to refer to in OCA-LR-4?

(d) Refer to the following sentences: "As a means of verifying the Postal Service's distribution keys, the Commission's model builds its own distribution keys. Therefore, each Postal Service component (555, 572, 1297, 1298, and 1299) is input into the model as a percent of total. The Postal Service's data for components 555, 572, 1297, 1298, and 1299 is input into the EXCEL spreadsheet DISTKEY.XLS...".

1. In the list of Postal Service components discussed in the second and third sentences, should component 572 be component 562? If not, please explain fully.

- 2. Please explain fully how inputting the Postal Service's factors as percents verifies the Postal Service's distribution keys. Please show all calculations and comparisons used in the verification process.
- A. (a) Confirmed.
  - (b) Confirmed.
  - (c) The correct Postal Service component number is 562.
  - (d) 1. Please see my response to part "(c)" of this interrogatory.
    - 2. The Commission's cost model requires that total square feet, total

rental values, parts and supplies, maintenance labor and capital be input as a percent

of total. My documentation explains the steps I took to update the Commission's cost

model and files to replicate Postal Service data. Further analysis of the Postal

Service's distribution keys was outside the scope of my testimony.

USPS/OCA-T100-12. Please refer to OCA-LR-4, page 31, Section C, which states in part: "[w]hen COSTMOD.EXE runs, the segment 3 differential pay costs are input into the Commission's cost component 301. Prior to running COSTMOD.EXE, component 301 is equivalent to the Postal Service's component 546. After COSTMOD.EXE runs, the costs in component 301 are adjusted to reflect the Postal Service's component 35 costs."

(a) Please confirm that executing COSTMOD.EXE serves as the vehicle by which differential pay costs are input into the Commission's cost component 301. If you do not confirm, please explain fully.

(b) Please confirm that after executing COSTMOD.EXE, there are additional steps by which the costs in component 301 are adjusted to reflect the Postal Service's component 35 costs. If you do not confirm, please explain fully.

(c) Please confirm that following these adjustments, the Commission's cost component 301 is identical to the Postal Service's component 35 and additionally, the equivalent of the Postal Service's component 546 ceases to by used. If you do not confirm, please explain fully.

(d) To your knowledge, does the Postal Service's cost model use components 35 and 546 differently? If so, please explain how they are used differently and provide documentation. If not, is component 546 unnecessary in the Postal Service's cost model?

(e) In the third paragraph, the following statement appears: "Di" calculates the incremental cost column *colseg*'. Please define the use of the term "incremental cost column. Is this analogous to the incremental cost discussion in the testimony of Witness Takis, USPS-T-41?

A. (a) Confirmed.

(b)-(d) Please see my response to USPS/OCA-T100-7(c). USPS-T-5,

Workpaper A at 15-16.1 identifies segment 3 mail processing costs as USPS

component "35 & 546". After executing the statement "COSTMOD BASEYEAR.BIN

BY96CP.FAC 2101 2101 BY96ACP.BIN < SCRIPT" and reviewing a printout of

BY96ACP.BIN (see OCA-LR-4, tab BY96ACP.BIN), PRC component 301 (3:1) is

equivalent to the Postal Service "Adjusted Mail Processing" (component 35) as shown

at USPS-T-5, Workpaper A-2 at 3. All subsequent program references in the updated version of the Commission's cost model would refer to the most current amount appearing in component 301.

COSTMOD.EXE appears to be the "vehicle by which differential pay costs are input into the Commission's cost component 301." Understanding how COSTMOD.EXE uses the information it receives from other files and how the Postal Service's cost model uses components 35 and 546 was not necessary for purposes of my testimony.

(e) As cited on page 32 of OCA-LR-4, that explanation of the subroutine "di" comes from PRC Op. R84-1, Appendix E at 10. I am not familiar with the testimony of Witness Takis.

USPS/OCA-T100-13. Please refer to OCA-LR-4, pages 35-36 and the following statements: "There are differences in the Postal Service's and the OCA's results. To more closely replicate Postal Service results, the following changes are made to the OCA's BY96CP.FAC factor file...." OCA Factor Numbers 143, 156, 157 and 164 are then listed.

(a) For each of the components listed, please explain in detail the reason(s) for the differences.

(b) Was there any analysis performed to understand the causes of these differences? If the response is affirmative, please provide copies and documentation of all tests performed, all hypotheses tested and an estimate of the amount of time expended for each of the stages of the analysis. If the response is anything other than affirmative, please explain in detail the reasons why it was decided that these differences were not of such significance to warrant further study.

(c) Please list any differences other than Factor Numbers 143, 156, 157 and 164, whether due to rounding or any other reason, and explain how these differences were resolved. Please provide documentation for the analysis completed, the results and an estimate of the time expended on this effort.

A. (a) - (b) I expected some rounding differences to occur between my results and

those provided by the Postal Service. The differences occurred in the last two digits of

an eight digit decimal and did not appear to warrant further analysis.

(c) I am not aware of other differences. I did not keep a record of the time I

spent identifying the factor number differences.

USPS/OCA-T100-14. Please refer to OCA-LR-4, page 36, where it states: "[I]n the future, if a problem with distribution calculations occurs, start comparing the Commission's components in segment 22 with the Postal Service's Base Year data." In Docket No. MC96-3, PRC-LR-5, Part I and in Docket No. R97-1, OCA-LR-6, the only explanation provided for segment 22 is "Working Storage". How would a comparison of Commission components with Postal Service components proceed? Please provide a list of steps that would accomplish this comparison.

A. The results of the calculations performed in segment 22 can be viewed by

limiting the number of statements the program is given to execute at any one time.

After the program executes the instructions it is given, the results in segment 22 can be

compared with Postal Service data. When the cost model results replicate Postal

Service data, additional statements may be added to the updated Commission's cost

model and the program run again. The procedure of limiting the number of commands

executed by the updated version of the Commission's cost model at any given time and

verifying program results may be repeated as often as necessary.

USPS/OCA-T100-15. Please refer to OCA-LR-4, page 36. Footnotes 14-17 cite USPS-T-5, Workpaper A-3 at 0.3 as the source of the amounts used to calculate OCA's Cost Model Inputs for components 143, 156, 157 and 164.

(a) Please confirm that USPS-T-5, Workpaper A-3 at 0.3 is the Postal Service's Base Year 1996 Factor Report.

(b) Please confirm that the calculations resulting in the Factor Report and the production of the Factor Report occur after the Postal Service's Manual Input Report is complete.

(c) Please confirm that the calculations resulting in the Factor Report and the production of the Factor Report occur after the Postal Service's A Report is complete.

(d) Please explain in detail how the OCA's cost model replicates the Postal Service's Peak Load Mail Processing Adjustments without relying on the output of the Postal Service's Factor Report. Please provide all workpapers and calculations.

(e) Please explain how the OCA's adjustments to its Cost Model Inputs verifies Postal Service data as indicated by title 2 on page 35: "A Comparison of the OCA's Peak Load Mail Processing Adjustments In BY96ACP.BIN Verifies Postal Service Data".

(f) Was any analysis done or OCA model executions performed using the OCA Calculated Results rather than the OCA Cost Model Inputs? If the response is affirmative, please provide copies and documentation of all analysis and executions performed and an estimate of the amount of time expended for the analysis. If the response is anything other than affirmative, please explain in detail the reasons why it was decided that the differences were not of such significance to warrant further testing.

A. (a) Confirmed.

(b) - (c) I am unaware of the order in which the Postal Service's reports are

prepared.

(d) - (f) The purpose of my testimony was to update the Commission's cost

model and replicate the Postal Service's Base Year, FY 97 and FY 98 results. I began

by accepting the Postal Service's Manual Input Requirement data. I updated the files

with information provided by the Postal Service including information from Postal

Service components 555, 562, 1297,1298. See OCA-LR-4 at 25-35. A comparison of the results I obtained using an updated version of the Commission's cost model showed that the model successfully replicated Postal Service data. Further verification of Postal Service data was not necessary for purposes of my testimony.

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USPS/OCA-T100-16. Please refer to OCA-LR-4 and the following statement that appears on page 41: "[e]ach OCA file is a copy of a file used by the Commission in Docket No. MC96-3, PRC-LR-5." Refer also to the end of section 2 on page 42 that describes the process of editing the Commission's program to eliminate errors, resulting in the edited file "OCARIP1.DAT"

(a) Please describe in detail all of the errors and problems that arose while attempting to update the Commission's MC96-3 ripple file.

(b) Please provide all analyses performed to understand the errors and formulate solutions to the error messages. Please provide copies and documentation of all programming analysis, all tests performed, all edits, all hypotheses tested and an estimate of the amount of time expended for each of the stages of the analysis.

A. (a) OCA-LR-4 at 42 describes in general terms the type of error message I got.

I did not keep a message log nor did I keep a problem log.

(b) I did not keep a record of the time I spent understanding and resolving errors

or problems encountered.

USPS/OCA-T100-17. Please refer to OCA-LR-4, pages 41-42. The following statement appears on page 41: "[f]or purposes of this documentation, the OCA's "ripple" files are OCARIP1.DAT, OCARIP2.DAT and OCARIP3.DAT". The following statement appears on page 42: "[s]ee library reference H-6 and H-4 for the commands appropriate to the ripple files in this docket". For each line of code in the files: OCARIP1.DAT, OCARIP2.DAT and OCARIP3.DAT:

(a) Please provide a complete explanation of each command in English. For example, please explain the expression "4,201,216,219,302,1,301" in English.

(b) Please provide the complete citation from USPS library references H-6 and H-.4 for each line of code appearing in OCARIP1.DAT, OCARIP2.DAT and OCARIP3.DAT. For example, provide the complete source, including page number, for the commands appropriate for "4,201,216,219,302,1,301".

A. (a) For purposes of my testimony, it was not necessary to understand how the

updated Commission cost model used the information provided in OCARIP1.DAT,

OCARIP2.DAT and OCARIP3.DAT. As described in OCA-LR-4 at 41-42, 47-48 and

49-51, I made copies of the Commission's Docket No. MC96-3, PRC-LR-5 ripple files

and edited out those lines where the component following the second integer

contained zeros. For illustrative purposes, the information provided in

"4,201,216,219,302,1,301" indicates that "4" PRC components "201, 216, 219 and 302"

are impacted by "1" (the second integer) component - PRC component 301. If PRC

component 301 had a value of zero, then the line "4,201,216,219,302,1,301" would

have generated an error message. To eliminate the error message, I subsequently

deleted the line from the file. Please note that PRC component 301 does not have a

value of zero.

(b) The reference to USPS library reference H-4 and H-6 in OCA-LR-4 at 42 appears to have caused confusion. When I updated OCARIP1.DAT, OCARIP2.DAT and OCARIP3.DAT, I did not use USPS library references H-4 or H-6. I deleted lines as described in OCA-LR-4. However for FY 97, I used both USPS library references H-4 and H-6 to prepare the "ripple" instructions needed to replicate Postal Service data. See OCA-LR-6 at 10-12.

USPS/OCA-T100-18. Please refer to the following paragraph from page 44 of OCA-LR-4: "In the Commission's cost model, components 2201 to 2299 are used as temporary working storage. Therefore, each of the Commission's cost model printouts is compared with the Postal Service's data prior to executing another program command. At present, the data in components 2201 (22:1) to 2221 (22:21) successfully replicate USPS-T-5, Workpaper A-3, Factor Report at 76-84."

(a) Please explain fully what the term "prior to executing another program command" means. For instance is the program halted at this point to verify the "temporary working storage" components 2201 to 2299?

(b) Does the term "each of the Commission's cost model printouts" mean every specific page of the Commission's model is compared to the Postal Service's model. If the response is anything other than affirmative, please provide a complete list of all of the "Commission's cost model printouts" that are compared.

(c) The terms "temporary working storage" and "[a]t present" indicate the transient nature of components 2201 to 2299. Did the initial comparison of components 2201 to 2221 show a successful replication of USPS-T-5, Workpaper A-3, Factor Report at 76-84? If the response is anything other than affirmative, please provide copies of all the printouts from the initial run to the final run that actually replicated the Postal Service's results.

(d) Please provide an estimate of the amount of time expended for each of the stages of comparing and editing the Commission's files to replicate the Postal Service's results.

A. (a) No. Please see my response to USPS/OCA-T100-14.

(b) When I executed the Commission's updated cost model, I visually compared

each printout I generated with Postal Service workpapers.

(c) No. Due to the volume of paper generated in one run of the cost model, and

given the potential for confusion over which printout was the most current, I kept only

the most current printouts. Copies of the printouts I retained are provided in OCA-LR-4,

-6 and -7.

(d) I did not keep a record of the time I spent comparing results and editing the OCA's file.

### USPS/OCA-T100-19. Please refer to OCA-LR-4, pages 45 and 46.

(a) Please refer to the statement: "sum "7" components (301,302, 303, 601,602, 603, and 604) and store the results in component 2170. The seven components represent administrative clerk's quality control and data collection costs." Please confirm that the sum of these components is more than the total costs for clerk's quality control and data collection costs. If you do not confirm, please explain fully.

(b) Please refer to the second line of code listed for SEG3SR.FAC: "xs,2171,3,301,302,303" and the first sentence on page 46: "[t]he line "xs,2171,4,301,302,303,306" instructs the computer to sum 4 components (301, 302, 303 and 306) and store the results in component 2171.

1. What is the correct line of code for SEG3SR. FAC?

2. Was either of the different lines of code the result of an earlier version of the OCA cost model? If the response is affirmative, please provide copies of all versions developed to arrive at the final version. If the response is anything other than affirmative, please provide an explanation for this apparent discrepancy.

A. (a) Confirmed. The seven components represent mail processing (PRC

components 301, 302 and 303) and city delivery carriers (PRC components 601, 602,

603 and 604).

(b) 1. The correct line of instructions should be:"xs,2171,4,301,302,303,306."

2. No. Upon review, I am unable to justify the omission of component

306.

USPS/OCA-T100-20. Please refer to the statement "a comparison of BY96BRP.BIN with the Postal Service's data confirms that the results are comparable. USPS-T-5, Workpaper A-1, A Report at 30-40.1."

(a) Does the term "comparable" mean equal to? If the response is anything other than affirmative, please provide the definition of "comparable" as used in this sentence. If possible, provide a quantitative definition, for instance, within a 2% difference.

(b) Please provide a complete list of all components compared with USPS-T-5, Workpaper A-1, A Report at 30-40.1 that are "comparable" and those that are identical.

A. (a) Please note that a cite to my documentation was not provided in your

interrogatory. However, I expected that there could be some rounding differences

between my results and those provided by the Postal Service. I did not use the term

"equal to" because in a mathematical sense my results are not identical to those of the

Postal Service. I did not establish a quantitative guideline when I ran the updated cost

model. However, the difference between my final results and the Postal Service's is

derived from exhibit OCA 107. The difference is 0.0002 percent, i.e., ((124 /

60,690,121)\*100).

(b) The following is a comparison of USPS-T-5, Workpaper A-1, A Report at 30-

40.1 with OCA-LR-4, at tab BY96LP.LR.

USPS Component Name	PRC Component No.	<u>Total Costs</u>
Supervisor Training Other	220	Identical
Supervision Rural Del	221	Identical
Supervision Veh Ser	222	Identical
Sup QC Rev Protect	223	Identical
Supervision CM Mark-up	224	Identical
Joint Sup Clk & Carriers	225	Identical

USPS Component Name	PRC Component No.	Total Costs
Other Super & Tech	218	Identical
Mail Processing	301	Identical
Window Services	304	Identical
Claims & Inquiry	310	Identical
Data Collection	309	Identical
Gen'l Office & Clerical	311	Identical
Quality Control	312	Identical
Training Schemes	313	Identical
Training Mail Proc Non-Par	314	Identical
Train Mail Proc Parcels	315	Identical
Training Other	316	Identical
Other	308	Identical

Please note that while each of the above total costs is identical, the individual subclass amounts making up total costs may have minor differences. While each total cost shown above is identical, there are minor differences between my results and those of the Postal Service. Therefore, I used the term comparable rather than identical. For example: USPS-T-5, Workpaper A, A report at 30, the Postal Service component titled "Supervisor Training Other" indicates that Special Delivery is "4" and Money Orders is "164". In BY96LP.LR, Special Delivery is "3" and Money Orders is "163" for PRC component 220.

USPS/OCA-T100-21. Please refer to the statement "some of the highlighted components contain zeros and cause program error messages" on page 49 of OCA-LR-4.

(a) Please provide a complete list of all "the highlighted components" that contain zeros and cause program error messages.

(b) Please provide a complete list of all non-highlighted components that contain zeros and cause program error messages.

(c) Please a complete explanation of why these components listed in response to (a) and (b) above caused program error messages.

A. (a) The PRC components that cause an error message because their values are

zero are 702 and 703.

(b) I am unaware of other components that have a zero value and cause

program error messages.

(c) OCA-LR-4 at 50, has the highlighted instruction "1,708,1,702". The

instruction indicates that "1" PRC component 708 is impacted by "1" PRC component

702. PRC component 702 has a value of zero. The instruction "1,709,1,703" indicates

that 1 PRC component 709 is impacted by "1" PRC component 703. PRC component

703 also has a value of zero. The instruction

"6,206,1203,1214,1225,1311,1319,2,702,703" indicates that "6" PRC components 206,

1203, 1214, 1225, 1311, 1319 are impacted by "2" PRC components 702 and 703. I do not have an in-depth understanding of how the cost model interprets each instruction it is given; that knowledge is not necessary for purposes of my testimony.

USPS/OCA-T100-22. Please refer to footnote 18 on page 50 of OCA-LR-4.

(a) Please fully explain why this particular line of code "generates an error message if the batch file "startup.bat" is used to run the Commission's cost model initially", while apparently the other lines of code do not.

(b) Please fully explain what is different in the Commission's model between the first program run and subsequent program runs that allow "STARTUP.BAT" to be used for the subsequent runs.

(c) Was an analysis performed to understand this particular error message? If the response if affirmative, please provide all analyses performed to understand what specifically caused this error message and formulate solutions to the error message. Please provide copies and documentation of all programming analysis, all tests performed, all edits, all hypotheses tested and an estimate of the amount of time expended for each of the stages of the analysis. If the response is anything other than affirmative, please provide the rationale for deciding that this error message was not worthy of investigation.

A. (a) I do not know why this line of code generated an error message. However,

the first time through the cost model programs PRC component 2245 could cause an

error message because it has a value of zero.

(b) I do not know specifically why the first pass through the cost model must be

manually performed while subsequent passes can be accomplished through a batch

file.

(c) No. Further analysis was not necessary for purposes of my testimony.

USPS/OCA-T100-23. Please refer to pages 51-54 of OCA-LR-4.

(a) Please confirm that the development of the 59.301% proportion of higher level supervisor variable costs occurs outside of the OCA cost model. If this is not confirmed, please provide a detailed explanation of how it is accomplished and show where it is accomplished in the model.

(b) Please explain in detail why "[t]he Postal Service's cost methodology changes require the addition of variability statements at the end of HLSDIST.FAC to reset program variabilities to 1 to eliminate previous variability settings." In your explanation, please address which particular variabilities are being cited and how this modification of the Commission's MC96-3 cost model was implemented.

(c) Please explain in detail how "[r]esetting variabilities in HLSDIST.FAC prepares the Commission's programs for the roll forward process." In your explanation, please address why these changes were required to replicate the Postal Service's roll forward results and how this roll forward implementation differs from the base year implementation described in part b.

(d) Please provide copies and documentation of all programming analyses, all tests performed, all edits, all hypotheses tested and an estimate of the amount of time expended to implement these changes in the base year and the roll forward years.

A. (a) Confirmed.

(b) -(c) Please note that the quote from OCA-LR-4 is at 54-55. The OCA data

file BY96LP.BIN is the file used to roll forward the Base Year costs to FY 97. The

HLSDIST.FAC file is the last opportunity the program operator has to reset the

variabilities back to 100 percent prior to generating the file BY96LP.BIN. The

variabilities being reset to "1" are shown in the HLSDIST.FAC file provided on the

diskette accompanying OCA-LR-4. A copy of the "va" statements as they appear in

that file follows. For clarity, the PRC component numbers whose variabilities are being

reset have been highlighted.

va,1,2110,1.0	/* Reset Variability (RV) - Com Fwd Sys
va,1, <b>2116</b> ,1.0	/* RV - Mail Proc BCS

va,1,2117,1.0 /* RV	- DBCS
	- CSBCS
va,1,2118,1.0 /* RV	- LSM
va,1,2119,1.0 /* RV	- FSM
va,1,2120,1.0 /* RV	- Par Sort & NMO Mach
va,1,2121,1.0 /* RV	- Facer/Cancel Ltrs
va,1,2122,1.0 /* RV	- Facer/Cancel Fits
va,1,2123,1.0 /* RV	- Culling
va,1,2124,1.0 /* RV	- Sack Sort Machine
va,1,2125,1.0 /* RV	- Sm Par & Bundle Sort
va,1,2126,1.0 /* RV	- Remote BCS
va,1,2128,1.0 /* RV	- ACDCS
va,1,2115,1.0 /* RV	- OCR
va,1,2145,1.0 /* RV	- Strapping
va,1,2144,1.0 /* RV	- Powered Trans Eq
va,1,2146,1.0 /* RV	- Gen/Log BMC
va,1,2147,1.0 /* RV	- Gen/Log Non-BMC

The modification to the Commission's cost model is explained in OCA-LR-4 at 5.

Prior to resetting the variabilites listed above to 1 (or 100 percent), the variabilites from

the printout of BY96BRP.BIN (OCA-LR-4 at tab BY96BRP.BIN) for each of the

highlighted PRC components are as follows:

PRC Component No.	Percent Variable
2110	91
2116	94.5
2117	94.5
2151	94.5
2118	90.5
2119	91.8
2120	90
2121	65.4
2122	65.4
2123	65.4
2124	99.0

PRC Component No.	Percent Variable
2125	59.2
2126	100.3
2128	82.9
2115	78.6
2145	74.5
2144	74,5
2146	63.3
2147	76.9

(d) I did not keep a log of the time spent implementing these changes.

# DECLARATION

I, Pamela A. Thompson, declare under penalty of perjury that the answers to interrogatories USPS/OCA-T100-11-23 of the United States Postal Service are true and correct, to the best of my knowledge, information and belief.

Executed Anney 27, 1998

Jamela Co hompson

### CERTIFICATE OF SERVICE

I hereby certify that I have this date served the foregoing document upon all participants of record in this proceeding in accordance with section 12 of the rules of practice.

Kennette hehardson

KENNETH E. RICHARDSON Attorney

Washington, DC 20268-0001 January 27, 1998