November 5, 1996 ILR 96-H

President R. Lane Beattie Speaker Melvin R. Brown Audit Subcommittee State Capitol Bldg Salt Lake City UT 84114

Subject: A Follow-up Review of School Textbooks and Supplies

Dear Legislators:

As you requested, we have conducted a follow-up to **A Performance Audit of School Textbooks and Supplies**, (report #96-02) released in February 1996. Our follow-up work was done to assess the level of teacher satisfaction following the expenditure of the \$ 9.5 million textbook and supply supplemental in fiscal year 1996 and to assess what progress the Utah State Office of Education (USOE) has made on our recommendations since the report was issued. We are pleased to report that teacher satisfaction in the larger districts has improved, leading us to believe that the \$9.5 supplemental has had a noticeable impact. In addition, the USOE has made some progress on our recommendations over the past eight months, although some issues still need to be addressed.

Our February audit report found that a textbook and supply crisis may have existed in the larger school districts. The teachers in smaller districts appeared more satisfied while those in larger districts were significantly more dissatisfied with textbook and supply quantities. However, both large and small district teachers appeared reasonably satisfied with textbook and supply quality. We also reported that the minimum expenditure requirement, used by the USOE to insure adequate levels of textbook and educational supply expenditures to the Legislature, was not reported accurately and was not meaningful as a measure of adequate textbook and supply expenditures. Finally, because one large district failed to account appropriately for teacher supplemental supply fund purchases, we believed that the districts needed more instruction and follow-up from the USOE on their expenditures of supplemental and one-time appropriation monies.

The results of our teacher survey along with the recommendations and the reported action taken by USOE staff are detailed in this letter.

Chapter II Recommendations and Reported Action

The first set of recommendations came from Chapter II, entitled "Textbook and Supply Crisis may Exist in Larger Districts". In our previous audit report we found that teachers in larger districts were significantly more dissatisfied with textbook and supply quantities than were those in smaller districts. Textbook and supply quality was reasonably satisfactory to both large and small districts. However, this measure was taken before the \$9.5 million textbook and supply supplemental appropriation had been spent by the districts during fiscal year 1996.

Recommendation #1

We recommend that the Legislature request a follow-up audit by the Legislative Auditor General's Office to be conducted during fiscal year 1997. The purpose of the follow-up will be to survey the level of teacher textbook and supply satisfaction after the \$9.5 million supplemental appropriation has been spent.

Reported Action: Implemented

Our September 1996 survey results indicate that teacher satisfaction in larger districts improved regarding both textbook and supply quantities. In addition, quantity satisfaction scores in the larger districts (districts with over 10,000 students) showed some improvement relative to satisfaction scores in the smaller districts, particularly with supplies. In our previous audit, the teachers in the smaller districts were more satisfied with quantities than were teachers in the larger districts. The quality satisfaction scores for both textbooks and supplies did not change much in either large or small districts. In this follow-up, quantity was defined in terms of adequacy of numbers. Quality was defined both in terms of physical condition as well as adequacy in meeting the prescribed task.

We sent a follow-up survey to 357 teachers who had supplied us with their name when responding to the previous survey. Of those who responded to our follow-up survey, we were able to match, by name and course taught, 156 teachers who supplied 185 responses. As in the previous survey, teachers were allowed more than one response if they taught more than one subject. We compared their satisfaction scores from the previous survey to their satisfaction scores from the follow-up survey. In our opinion, the \$9.5 million supplemental appropriation has had a positive impact on teacher satisfaction.

In assessing satisfaction with quantity, we asked two critical quantity satisfaction questions: "Overall, how satisfied are you with the quantity of **textbooks** made available for you to teach your class?" and "Overall, how satisfied are you with the quantity of **materials** made available for you to teach your class?" Teachers were allowed to respond using a sliding scale of "very dissatisfied", "dissatisfied", "slightly dissatisfied", "slightly satisfied", "satisfied", or "very satisfied". For all analyses, we discarded any responses left blank, or any responses marked as "not applicable". In order to do a mean analysis, we numerically coded the 6-point sliding scale as follows: "very dissatisfied" as 1, "dissatisfied" as 2, "slightly dissatisfied" as 3, "slightly satisfied" as 4, "satisfied" as 5, and "very satisfied" as 6.

The teachers in the larger districts showed an increase in satisfaction with both textbook and supply quantities when compared with their responses in the September 1995 survey. The average response from the 1996 follow-up survey for teacher satisfaction with textbook quantities is 4.27 (slightly satisfied). In 1995, these same teachers averaged 3.72 (slightly dissatisfied) with textbook quantities. Figure I compares the categorical teacher satisfaction responses regarding textbook quantities in large districts before the \$9.5 million was spent (1995) and after the \$9.5 million was spent (1996).

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1995

Large District Responses to Satisfaction Questions on Textbook Quantities 1996 vs 1995									
	Very Dissatisfied	Dissatisfied	Slightly Dissatisfied	Slightly Satisfied	Satisfied	Very Satisfied	Total Responses		
1996	13	13	7	8	46	29	116		
	total of 3 categories = 33 (28.45 percent)				total of 3 categories = 83 (71.55 percent)				

19

"very dissatisfied" + "dissatisfied" = 26 (22 percent)

13

total of 3 categories = 45

(39.13 percent)

"very dissatisfied" + "dissatisfied" =

34 (30 percent)

"satisfied" + "very satisfied" =

75 (65 percent)

34

total of 3 categories = 70 (60.87 percent)

"satisfied" + "very satisfied" =

51 (44 percent)

17

115

Figure I

As seen in Figure I, teachers in the larger districts expressed more satisfaction with textbook quantities in 1996 than they had in 1995. Specifically, 71.55 percent of the teacher responses in the 1996 follow-up survey expressed some level of satisfaction compared with 60.87 percent in the 1995 survey. Further, 65 percent of the teacher responses in the 1996 survey are either "satisfied" or "very satisfied" compared with 44 percent stating similar satisfaction in the 1995 survey.

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Similar changes in satisfaction are also seen with regards to supply quantities. In 1995, the average response from these teachers regarding satisfaction with supply quantities was 3.56 (slightly dissatisfied). However, in our 1996 follow-up, these same teachers had an average response of 4.29 (slightly satisfied) with supply quantities. A comparison of categorical responses for years 1995 and 1996 (before and after the \$9.5 million supplemental) are shown in Figure II.

14

22

total of 3 categories = 49

(42.24 percent)

"very dissatisfied" + "dissatisfied" =

36 (31 percent)

1995

Figure II Large District Responses to Satisfaction Questions on Supply Quantities 1996 vs 1995								
	Very Dissatisfied	Dissatisfied	Slightly Dissatisfied	Slightly Satisfied	Satisfied	Very Satisfied	Total Responses	
1996	8 total		56 of 3 categoric (75.63 percent		119			
	"very dissa	atisfied" + "dis 18 (15 percent		"satisfied" + "very satisfied" = 71 (60 percent)				

24

38

total of 3 categories = 67

(57.76 percent)

"satisfied" + "very satisfied" =

43 (37 percent)

5

116

As shown above, there has been a shift towards more satisfaction from 1995 to 1996. In 1996, 75.63 percent of the teacher responses reported some level of satisfaction with supply quantities compared with 57.76 percent in 1995. Also, 60 percent of the 1996 responses were either "satisfied" or "very satisfied" with supply quantities compared with 37 percent in 1995.

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Not only did the teacher responses in larger district improve relative to prior responses, the responses also improved relative to teacher responses in smaller districts. As reported in our previous audit on textbooks and supplies, larger districts were more dissatisfied with both textbook and supply quantities. Based on our follow-up survey, these differences in satisfaction appear to be lessening, particularly in the area of supplies.

As previously stated, the 1996 average teacher satisfaction response in the larger districts with supply quantities is 4.26 (slightly satisfied). The 1996 average teacher satisfaction response in the smaller districts with supply quantities is 4.32 (slightly satisfied). In 1995, these same teachers in the larger and smaller districts had average satisfaction responses of 3.56 (slightly dissatisfied) and 4.35 (slightly satisfied), respectively. Not only did the average responses between larger and smaller districts converge, the responses by category did too as shown in

Figure III.

Figure III Responses to Satisfaction Questions for Supply Quantities Large vs. Small Districts 1996								
	Very Dissatisfied	Dissatisfied	Slightly Dissatisfied	Slightly Satisfied	Satisfied	Very Satisfied	Total Responses	
Large* Districts	8 10 11 total of 3 categories = 29 (24.37 percent)			19 56 15 total of 3 categories = 90 (75.63 percent)			119	
	•	ntisfied" + "dis 18 (15 percent)	"satisfied" + "very satisfied" = 71 (60 percent)					
Small Districts		9 of 3 categories (23.81 percent)			28 of 3 categori (76.19 percer		63	

"satisfied" + "very satisfied" =

38 (60 percent)

Figure III shows, the categorical responses of the larger and smaller districts are similar. Within the larger districts, 75.63 percent of the responses reveal some level of satisfaction. Further, 60 percent of the responses are either "satisfied" or "very satisfied". Within the smaller districts, 76.19 percent of the responses indicate some level of satisfaction with 60 percent of the responses reporting either "satisfied" or "very satisfied". As a means of further comparison, in 1995, 57.76 percent of these same teachers in the larger districts indicated some level of satisfaction. Further, only 37 percent of the teachers reported either "satisfied" or "very satisfied". On the other hand, 76.19 percent of these same teachers in the smaller districts indicated some level of satisfaction with 56 percent reporting either "satisfied" or "very

"very dissatisfied" + "dissatisfied" =

11 (17 percent)

*Large = Over 10,000 students in the district

satisfied". Given these comparisons, satisfaction within the larger districts regarding supply quantity appears to have significantly improved. Satisfaction with textbook quantities has also improved within large districts though not as dramatically.

The average level of textbook quantity satisfaction reported in our follow-up by teachers in larger districts is 4.27 (slightly satisfied) while the teachers in smaller districts averaged 5.06 (satisfied). In 1995, these same teachers averaged within the larger districts 3.72 (slightly dissatisfied) and 4.93 (slightly satisfied) within the smaller districts. While both larger and smaller districts changed response categories, the larger districts' responses showed more improvement. The changes in categorical responses are shown in Figure IV.

Figure IV Responses to Satisfaction Questions on Textbook Quantities Large vs. Small Districts 1996								
	Very Dissatisfied	Dissatisfied	Slightly Dissatisfied	Slightly Satisfied	Satisfied	Very Satisfied	Total Responses	
Large* Districts	13	13	7	8	46	29	116	
	total	of 3 categories (28.45 percent)	total of 3 categories = 83 (71.55 percent)					
	•	ntisfied" + "dis 26 (22 percent	"satisfied" + "very satisfied" = 75 (65 percent)					
Small Districts	0 tota	4 l of 3 categories			31 of 3 categorie		63	
	(9.52 percent) "very dissatisfied" + "dissatisfied" = 4 (6 percent)				(90.48 percent) "satisfied" + "very satisfied" = 54 (86 percent)			
*Large = Over 10,000 students in the district								

Figure IV shows 71.55 percent of the responses within the larger districts indicate some level of satisfaction with 65 percent indicating either "satisfied" or "very satisfied". Within the smaller districts, 90.48 percent of the responses indicate some level of satisfaction with 86 percent reporting either "satisfied" or "very satisfied". In 1995, these same teachers responded as follows: within the larger districts, 60.87 percent reported some level of satisfaction with textbook quantities with 44 percent reporting either "satisfied" or "very satisfied"; however, within the smaller districts, 88.33 percent reported some level of satisfaction with 78 percent reporting either "satisfied" or "very satisfied". Based on this comparison, while the smaller districts are still more satisfied with textbook quantities than the larger districts, it does appear that the larger districts have closed the gap, to some degree, between the larger districts' and the smaller districts' satisfaction with textbook quantities.

While improvements were found in the satisfaction scores regarding quantity, the satisfaction averages for quality did not change much. In our opinion, this is not a concern since the average scores in all cases are either "slightly satisfied" or "satisfied". Specifically, the 1996 responses within the larger districts for textbook quality averaged 4.56 (slightly satisfied) while in 1995 the responses averaged 4.26 (slightly satisfied). The 1996 responses within the larger districts concerning supply quality averaged 4.65 (slightly satisfied) while in 1995 the responses averaged 4.15 (slightly satisfied). Within the smaller districts, the 1996 average response for textbook quality was 5.03 (satisfied) while in 1995 the average response was 5.07 (satisfied). Regarding supply quality, the average response in 1996 was 4.73 (slightly satisfied) while in 1995 the average response was 4.81 (slightly satisfied). Certainly these overall responses could improve, however, these responses do not appear to us to indicate a cause for concern.

In summary, the satisfaction levels regarding both textbook and supply quantities have improved, particularly within the larger districts. The satisfaction levels regarding quality have not changed much, however, this is not a cause for concern since the overall satisfaction levels are either "slightly satisfied" or "satisfied".

Recommendation #2

We recommend that the Legislature include in the above follow-up, a request for a determination of the percentage of the \$9.5 million supplemental spent for textbooks and supplies.

Reported Action: Not Implemented

Because of time constraints in performing this follow-up, we were unable to include a determination of the percentage of the \$9.5 million supplemental which was spent during fiscal year 1996. If the Legislature desires, we can make this determination as part of our

proposed 1998 follow-up concerning the minimum school expenditures on textbooks and supplies which is found on page 11.

Chapter III Recommendations and Reported Action

The second set of recommendations comes from Chapter III, titled "Minimum Expenditure Reporting is not Accurate." In this chapter, we found that the 4 percent minimum expenditure requirement, used by education to insure adequate levels of textbook and educational supply expenditures to the Legislature, was not reported accurately. First, the USOE allowed the districts to use expenditures from any funding source (including supplemental supply funds and federal funds) to meet the minimum expenditure requirement rather than allowing only those funding sources upon which the minimum expenditure requirement was calculated (i.e., the Total Basic School Program). Second, some districts' reported expenditures that were inappropriate given the definitions established by the USBE. In addition to having questionable value as a measure of adequate expenditures, the minimum expenditure requirement also appeared to promote spending inequities among the districts. Our recommendations focused on making the minimum expenditure criterion a meaningful and equitable measure.

Recommendation #1

We recommend the Legislature again include language in future legislation that specifies their intent regarding expenditures for textbooks and educational supplies.

Reported Action: Not Implemented

To date, the Legislature has not redefined in the **Utah Code** what it believes the purpose of the minimum expenditure requirement should be. In 1987, the **Utah Code** stated that it was "the intent of the Legislature that state and local minimum school program funds shall be expended for adequate amounts of textbooks and educational supplies before those funds are used to supplement secondary school activities." This intent language is no longer in the **Utah Code**. If the Legislature intends the minimum expenditure requirement to report primarily on expenditures of state and local minimum school program funds, the Legislature should again consider adding such language to the **Utah Code**.

Recommendation #2

We recommend that the Utah State Board of Education:

- a) Specify the purpose of the 4 percent minimum requirement;
- b) Reassess the methodology used to calculate the required minimum and determine if it is equitable for both large and small districts;

- c) Assess if the minimum requirement should continue to be a ratio or if it should be expressed on a per student basis;
- d) If the minimum requirement continues to be expressed as a ratio, assess whether 4 percent is a reasonable ratio or determine a new ratio;
- e) Specify what funding sources should be included for reporting minimum expenditures.

Reported Action: In Process

The USOE has proposed a modification to the administrative rule that requires school districts to spend a minimum amount of funds for textbooks and supplies. Instead of calculating the required minimum as 4 percent of the Total Basic Program from the Minimum School Program, the proposed change will calculate a districts' required minimum expenditure as 5.5 percent times the value of the current year's weighted pupil unit multiplied by the prior year's average daily membership. This new formula considers both the number of students in each district as well as the annually adjusted state funds available to each district. As a result, this formula should be more equitable to both large and small districts.

While the ratio was changed from 4 percent to 5.5 percent, we were told that this ratio was selected simply to maintain a monetary level similar to that required in Fiscal Year 1994. While this may be a reasonable interim step, we believe the USOE should clearly define the purpose of the minimum expenditure requirement and throughly analyze what would be a reasonable expenditure ratio.

In addition, the USOE has not made any definition as to what funding sources can be included for reporting minimum expenditures. We reviewed the reported fiscal year 1996 expenditures for two districts (District A and District C from the original audit). While we noted that District C was no longer including school disbursements in the reported expenditures on the F-4 report, we did find both districts continued to report expenditures using supplemental appropriation funds. Since a \$9.5 million supplemental appropriation and a \$3 million one-time teacher supplemental were distributed to school districts during the 1995-96 school year, districts could easily meet the minimum expenditure requirement using these supplemental funds. The USOE administrators state they will deduct reported expenditures that use supplemental textbook and supply funds from each district's reported minimum.

Recommendation #3

We recommend that the Utah State Office of Education:

- *a)* Insure that training and instruction is provided to the districts regarding the revised methodology for reporting educational supplies;
- b) Consider using the districts' single audit process as a method of monitoring information reported by the districts to ensure it is consistent and appropriate;
- c) Determine what actions are appropriate to enforce district compliance with the minimum expenditure policy.

Reported Action: In Process

The USOE has provided districts with information about the proposed revisions to the administrative rule concerning minimum expenditures but has not yet provided specific guidance on reporting procedures. The proposed new rule does not identify how the USOE will monitor the consistency and appropriateness of reported expenditures. In addition, no formal consequences for non-compliance are being considered.

Recommendation #4

We recommend that the Legislature request a follow-up audit by the Legislative Auditor General's Office to re-examine changes to the minimum expenditure requirement and report back to the Legislature in fiscal year 1998.

Reported Action: Not Implemented

To date, the Legislature has not requested that we perform a follow-up audit to re-examine changes to the minimum expenditure requirement.

Chapter IV Recommendations and Reported Action

The recommendations from Chapter IV regarding the accountability of the teachers' supplemental classroom supply funds, were intended to insure that the funds were distributed appropriately, and that expenditures were documented and verified that the funds were used for classroom supplies.

Recommendation #1

We recommend that the USOE provide more detailed instruction to districts on the distribution, accounting, expenditure and documentation of teachers' supply funds.

Reported Action: Partially Implemented

According to the USOE Director of Finance, no formal or written instructions were given to district administrators regarding the appropriation for classroom supplies. However, at a summer meeting of district administrators, the USOE discussed the distribution and the importance of accounting for classroom supply funds. In addition, the finance director at USOE recently sent a letter to all district business administrators reminding them that the classroom supply funds must be accounted for just as would any other expenditure, and documentation just be provided. Otherwise, the funds would be treated as personal income with appropriate taxes and other withholdings made.

Recommendation #2

We recommend that the USOE review a sample of school districts' policies and procedures and follow-up on the expenditures of teachers' supply appropriations to ensure compliance with legislative intent.

Reported Action: Not Implemented

The USOE did not review any district policies or procedures regarding the teachers' supplemental supply funds. Neither did the USOE review any of the expenditures of these funds to verify that they were spent appropriately. According to USOE directors, the review of expenditures from special appropriations for classrooms supplies should be part of every school district's annual independent audit. The USOE does not consider this level of review to be within the scope of their responsibility.

We hope this letter has provides you with the information you need. If there is any additional information you want or any points on which you would like further clarification, please feel free to contact our office.

Sincerely,

Wayne L. Welsh Auditor General

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