June 30, 1926.

Memorandum to Mr. Woodward

From Mr. Allin-Smith

Subject: Extent and Cost of Teaching by Assistants in the several Departments.

Incidental to our analyses of departmental records and of unit teaching costs for the Portfolios, a considerable variation is seen in the cost and extent of teaching by Assistants, the rank under that of Instructor, between the Arts, Literature and Science departments. The following facts grow out of a special study of courses for which Assistants and some Fellows were specifically responsible during the Autumn, Winter and Spring quarters just concluded. In some of the medical departments, and probably in other departments also, assistants were employed merely to "assist" a higher rank instructor in a course, but in such cases the present records do not show the facts (although they should) and assistance of this sort is not considered here.

Percentage of Registration Taught by Assistants: In the three quarters combined, the extent of assistant teaching ranged from the highest, 27.33% in Physics to 1.65% in Latin. This is the percentage of the total student registration in the department which was taught in classes for which assistants were responsible. The range of attendance shows the majority of students in these classes to be juniors; but there is also a substantial total of senior registration, together with a scattered graduate attendance. A number of important departments are above 20% in this respect, Physics, Astronomy, English, Sociology, Political Economy, and Mathematics (as the following table shows); and as some of them are distinctly graduate departments, I raise the question whether this is a proper proportion to be taught by low-rank instructors.

Astronomy	27.33% 26.93 24.43 22.90 22.52 21.22 15.49 15.03	Geology Philosophy History Political Science Romance Psychology C. and A. (largely in Pol. Econ.)	13.47% 10.18 9.32 8.17 7.85 6.99 2.56 2.52 1.65
		Latin	1.65

Costs per Course: The following tabulation shows the wide range between departments in the amounts paid to assistants for teaching. The difference between \$100. in Philosophy and \$533.33 in Political Economy or \$566.66 in C. and A. is so considerable as to raise the question whether there can be any equivalent difference either in the quality or the value of assistant instruction in one department as compared with another, and whether

. June 30, 1940. Biswhodw . The of mubneronal StimE-rillia . ME mori Buildest: Butant and Cost of Teaching .etmentrans Incidental to pur saalyees of departmental records and of unit teaching costs for the Portfolios, a considerable mariation is seen in the <u>cost</u> and <u>extent</u> of teaching by sesistants, the rank under that of instructor, between the late, literature and Science de-partnents. The foll ortag facts grow out of a special study of courses for which Apsiabanth and some Wallows wars adentically responsible during the Autumn, Minter and Spring quarters just concluded. In some of the medical Separtments, and properly in other departments also, ausiatants were employed memoly to "assist a higher rack instructor is a course, but in such cause the present records do not show the facts (although they should) and samistance of this sort is not considered bare. Percentare of Merieterion Taught by Assistants: In the three quarters combined, the extent of seciatent teaching ranged from the highest, 27.334 in Physics to 1.555 in Latin. This is the percentage of the sound Student registration in the department with was taught in charges for which assistants were responsible. The ta he janiore; but there is also a substantial total of senior registration, together with a sexttered graduate attander of A number of important departments are above 20% in this respect, 20, sice, Astronumy, Inglieb, Sordology, Political Poncey, and Methematics (so the following table snows); and se abuse of them are distinctly graduate departments, I mine the question whether this is a proper ji quortion to be taught by low-ratio instructors. 5.43 84.0 . • 17 52.0 . Whomood Inclition 25.12 . . 54.71 . C. and A. Harristaly 20.03 (.ueps .log ni Coata par Cebras: (The rollowing tabaletion prove the wide range between laps then to in the consumpts pais to semistarts for tesuhing. The difference between 2100. In Unifordiffy and 0931.33 in Political Boardary or WYG. 66 in 0. and 1. is so count caradic as to reach the qualitan whether there are as any equivalent of as

tion is one department as command with another, and weather

there should be more uniformity in the university's payments for such instruction.

	Number of Assistant Courses	Cost	per Course
Philosophy Psychology Political Economy Political Science			\$100. 200. .33- \$250.00 200.
History Sociology Romance	e 3 9 12 5 3	200	250. .00- 126.66 200. 200.
Germanics Latin English Mathematics	42 10		175. .66- 170.00 .00- 126.66
Astronomy Physics Geology Geography Botany (pts. of C. & A. (see Pol	3 15 3 5 courses)7 . Econ.)2	210	200. 250. 116.66 .00- 200.00 .00- 150.00 .66- 300.00

Our analyses of unit costs of instruction per student-major for several recent quarters make it perfectly clear that the relatively low cost of instruction by instructors and under ranks, together with large registrations, are two factors in giving low unit costs to undergraduate instruction in Arts, Literature and Science departments (in 1924-25, senior \$17.52, junior \$12.80 per student-major throughout the University). These figures should be contrasted with the amount the undergraduate pays for a major (\$25. and now \$30.) on the one hand, and on the other with the much higher cost of instructing the graduate students (\$43.60 in 1924-25) who pay only \$20. per major when they do not have their tuition remitted.

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Cast per Course	Dopartment Assistant Courses
\$200. 200. \$533.335 \$250.00 200.	Philosophy Pey shology Political Sonogy 26 Political Sotence Sistory
200.00- 126.66 200. 200.	Socialogy 12 Romance 5 Cermanice 3
326.66- 170.00	Latia - Eacligh Mathematica 10
209. 250. 116.66	Astronomy Physics Geology
240.00- 200.00 210.00- 150.00 560.66- 300.00	Geography Botany (pts. of courses) 7 0. & A. [see Fol. Eton.) 2

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Memorandum to Mr. Woodward

From Mr. Allin-Smith

Subject: The Survey.

With the chance that we shall not have a conference with Mr. Mason before my vacation begins tomorrow, I am putting in writing several points for consideration. Of course I shall be ready to come back to Chicago at any time before August first to consider the question of continuing a survey with you, for it has a direct bearing on how I am to spend my energies in the next year or two. If a survey is to continue, I feel that it ought to move with speed and with some purpose. This it has not done in the two years I have held myself ready to work upon it. My memorandum to Mr. Arnett dated April 20th covered all the propositions about the continuation of the survey that I now wish to have before the President in the following brief points:

1. It ought to have first an official introduction to the faculty, so that the investigations which it undertakes shall proceed openly, directly, and (it may be hoped) with the fullest recognition and cooperation of all in the University community.

2. The survey staff should be attached to some administrative office, preferably perhaps the President's.

3. A specific plan should be prepared, with the consent and suggestion of those persons among the Deans, the Faculty, and particularly the School of Education who are qualified to speak on the scope of a survey. A survey committee of two or three progressive and alert men might be appointed to exercise a general supervisory and interpretative purpose.

4. When an agreed plan is determined, it would be well to pursue the studieson a large scale with a considerable staff, and get them done quickly, rather than to continue the piecemeal methods of our interrupted investigations so far.

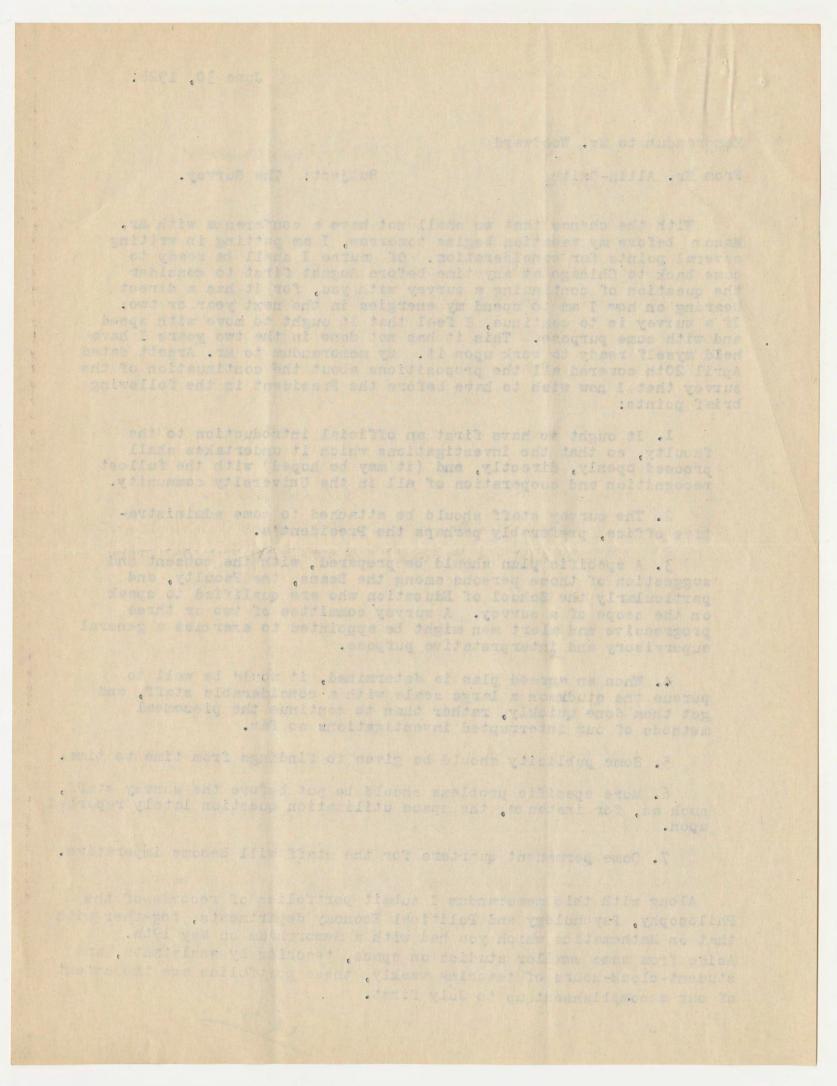
5. Some publicity should be given to findings from time to time.

6. More specific problems should be put before the survey staff, such as, for instance, the space utilization question lately reported upon.

7. Some permanent quarters for the staff will become imperative.

Along with this memorandum I submit portfolios of records of the Philosophy, Psychology and Political Economy departments, together with that on Mathematics which you had with a memorandum on May 19th. Aside from some smaller studies on space, teaching by assistants, and student-clock-hours of teaching weekly, these portfolios are the extent of our accomplishment up to July first.

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May 26, 1926. Ad copy

Memorandum to President Mason and Vice-President Woodward From Mr. Allin-Smith

Subject: Utilization of Classroom Space.

The question of use of University rooms was recently raised, and as no record of earlier studies could be discovered, I undertook to make an analysis of classroom utilization during the present (Spring) quarter, for a total of 47 rooms in Cobb, Harper, Classics, Commerce, Law, and Lexington, used for the most part by Arts and Literature departments and assigned through the Recorder's office. Of these 47 rooms, 26 are in Cobb, 7 in Classics, 6 each in Harper and Commerce, and one each in Law and Lexington. In the summary of the study which follows, the buildings are considered as units, although records in detail are available for each room in each building.

I have sought to enswer these questions:

- (1) In how many available hours are the rooms used? (room-hours)
- (2) What proportion of the seating capacity is occupied? (student-hours)
- (3) What proportions of morning and of afternoon hours are utilized, and what proportion of capacity in each case?

Calculations have been put on a weekly basis throughout, for uniformity. I have assumed that eight hours daily, from 8 a.m. to 4:30 p.m., are regularly available for the use of each room, on five days, Monday to Friday, excluding a consideration of Saturday hours, thus giving 40 hours of possible use weekly. May 26, 1926.

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- 2 -

The summary table attached gives the complete figures by buildings and in total, about which I make brief statements here. On a weekly basis, then, for the present quarter, the figures show for the buildings and 47 rooms studied:

(1) That the weekly use of total available hours (40 hours each for 47 rooms, or 1880 room hours) is 1078, or 57.34%. In Cobb Hall, however, the hourly utilization was 58.94%, Marper 59.58%, Classics 50.00%, Commerce 60.00%, one room each in Law and Lexington 57.50% and 37.50% respectively.

(2) That the proportion of seating capacity occupied in the rooms, on a weekly basis is 27.51% (of a seating capacity in 47 rooms totaling 2368 students, multiplied by 40 available hours weekly, equaling a total capacity weekly of 94420 student-hours.) In Cobb Hall alone the student-hour utilization is 28.02%, in Harper 30.25%, Classics 21.64%, Commerce 26.17%, one room in Law 36.60%, and one room in Lexington 22.50%.

If the use of Cobb Hall, for comparison, is taken to be a guide to desirable occupancy, then Harper is somewhat crowded, while Commerce and especially Classics are under-occupied. In Classics the cause of this low average is relatively smaller and fewer classes generally.

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buildings studied, both as to hours and as to capacity, than afternoon utilization. Considering 20 morning and 20 afternoon hours weekly (4 each day in 5 days), the morning occupancy in these buildings is 73.6% of the available morning room-hours, and 41.0% of the available room-hours in the afternoon. For Cobb Hall the figures are 74.0% and 43.8%, for Harper 72.5% and 46.6%, for Classics 73.6% and 26.4%, for Commerce 78.3% and 41.6%, morning and afternoon respectively.

As to capacity utilization morning and afternoon, in student hours weekly, the total for 47 rooms shows morning occupancy to be 42.40% and afternoon 12.62% of capacity. In the various buildings, Cobb Hall percentages are 42.78% mornings and 13.26% afternoons; Harper 49.56% and 10.94%; Classics 34.68% and 8.60%; Commerce 38.28% and 14.06%. It should be noted that the use of Harper H-11 (Lecture Room) for lecture purposes averages about two hours weekly, but only the classroom use of that room is figured into these percentages.

The details of the analysis appear in the condensed tables accomponying this statement, and the analysis of each room is available in the working sheets if it is desired.

It is interesting to add the following averages for this comparisons That the average capacity of the 47 classrooms here studied is 54, and that the average size of classes in them in the Spring quarter is less than half the capacity or 23.7 (251 classes with a total attendance of 5950 students).

A special computation for the nine classrooms on the fourth floor of Cobb Hall is also interesting. They have a total capacity of 408 students. Of the weekly room-hours available (9 rooms at 40 hours a week, or 360), they were used 40% of the time, as com-

- 3 -

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pared with 58.94% in Cobb Hall as a whole, and 57.34% in the 47 roomstudied. In seating capacity weekly, 3008 out of 16320 student-hours were utilized, or 18.4%, as compared with 28.02% in Cobb Hall as a whole, and 27.51% in the 47 rooms studied. In the morning hours they were occupied 63.3% of the time, in the afternoon 15.5% of available time, as compared with 74.0% and 43.8% for Cobb as a whole, and 73.6% and 40.5% of hours, morning and afternoon respectively, for the 47 rooms studied. Undoubtedly these rooms, of good size, averaging 45 seats each, are handicapped by their height above ground and find inadequate use for that reason particularly, especially in the Spring quarter. None of them is occupied at the 8-9 hour, none after 2:30, except one class for one hour daily at 2:30 this quarter.

In considering the percentages of use here revealed, the fact that a Spring quarter has been studied indicates that the use of rooms, so far as student registration is a factor, is probably at its lowest quarterly figure for the academic year, if this Spring quarter may be taken as typical; and therefore the figures represent the lightest quarterly domands made on classroom space in the year. Secondly, the fact that Arts and Edterature classroom use has been studied may be taken as representative of Arts and Literature in general, but cannot be taken as an indication of percentage use of laboratory space in scientific buildings or of other classroom space in the professional schools. But the study of such important buildings as Cobb, Harper, Classies and Commerce covers a group of the most used classrooms for a large share of the quarterly University registration, and thus applies to some of the most significant space on the quadrangles.

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I. SUMMARY OF WEEKLY CLASSROOM USE IN 47 ROOMS - SPRING QUARTER, 1926

Class	ro ons	Total Hourly Capacity	Avail	ly Use of Lable -Nours	Percentage of Hourly Use	Weekl of Ava Capaci Student	ilable ty in	Percentage of Student Capacity Uses
Cobb Hall	26 rooms	1314	613 0	of 1040	58.9	14726 o	\$ 52560	28.0
Harper	6 *	372	143	» 240	59.6	4501	^a 14880	30.3
Classics	7 °	286	140	» 280	50.	2476	* 11440	21.6
Commerce	6 *	292	144	* 240	60.	3057	¤ 11680	26.2
Law, West	l room	64	23	* _ 40	57.5	939	° 2560	36.7
Lexington	1 *	40	15	* 40	37.5	360	* 1600	22.5
Totals	47 rooms	2368	1078	* 1980	57.3	26059	• 94720	27.5

II. SUMMARY OF WEEKLY CLASSROOM USE, MORNING VS. AFTERNOON HOURS IN 47 ROOMS, SPRING QUARTER, 1926

Room-Hour Use							Student-Hour Use						
C	lassrooms		* Available Hours	Used A.M.	z	Used P.M.	\$	* Available Hours	Used A.M.	ħ	Used P.M.'	%	
Cobb Hal	1 26	rooms	520	385	74.0	228	43.8	26280	11243	42.8	3483	13.3	
Harper	6	n	120	87	72.5	56	46.6	7440	3687	49.5	814	10.9	
Classics	7	-	140	103	73.6	37	26.4	5720	1984	34.7	492	8.6	
Commerce	. 6	a	120	94	78.3	50	41.6	5840	2235	38.3	822	14.1	
Low, WEst	1	room	20	18	90.0	5	25.0	1280	803	62.7	136	10.6	
Lexingto	m 1	8	20	5	25.0	10	50.0	800	135	16.9	225	28.1	
Tote	ls 47	rooms	920	692	73.6	386	41.0	47360	20087	42.4	5972	12.6	

* Available each morning and afternoon, weekly.

I. HURBARY OF WEEKLY CLASSROOM USE IN 47 ROOMS - DENING QUARTER, 1926

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01235	KO ODR	Total Hourly Capacity	Aval Room	JUP	le	Fercentage of Hourly Use	of Av Capac	ly Use silable ity in t-Hours	Percentage of Student Genecity
Cobb Enll	26 room	1314	613	or .	1040	58.9	14726	or 52560	28.0
Tarper	ę 4	372	143	10	240	59.6	4501	a 14080	30.3
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Commerce	6 0	292	144	-	540	60.	3057	# \$1680	26.2
Law, West	l room	64	53		- 40	57.5	7 030	a 2560	36.7
Lexington	4 a	40	15	8	40	33.5	360	# 4600	22.5
Totale	47 room	\$369	1078		1880	57.3	56055	a 94720	\$3.5

II. CUMENNY OF WEALLY CLASSHOOM USE, MORNING VD. AFTERHOOM HOURS IN 47 NOCEM, SIRIEG QUARTER, 1926

			Room~Ho	ur Joe			5	endent.	-Jour U	66		
Class:		* foliovà Houri	ble Vect			8	* Aveilabie Roure				×	
CODD HAIL	26 200	ome 250	385	74.0	859	43.8	26280	11243	\$5*0	3403	13.3	
Marper	ę ,	150	03	72.5	96	46.6	7440	3667	49.5	814	40.9	
Classics	3 •	. 140	103	-73.6	33	26.4	5720	1984	34.7	192	8*6	
Connerce .	ė .	450	94	18*3	50	41.6	5940	3235	39.3	855	14*1	
Low, WEOt	1 2.00	ma 20	48	90.0	5	25.0	1230	803	62.7	136	10.6	
Lexington	4 .	50	9	25.0	. 10	50.0	000	135	16.9	225	50.1	
Totals	47 rot	920	692	73.6	386	41*0	47360	20087	12.4	5972	12.6	

* Available each norming and afformoon, weekly.

June 1, 1926.

My dear Mr. Payne:

Enclosed you will find a copy of an analysis of classroom utilization recently made by Mr. Allin-Smith. I should be very glad to have you study the analysis and make whatever comments you wish. This is the only copy I have, and I must therefore ask you to return it to me.

Yours sincerely,

Frederic C. Woodward (signed)

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FCW:S Encl. June 1, 1926.

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FOW:S Encl. Memorandum to President Mason and Vice-President Woodward From Mr. Allin-Smith

Subject: Utilization of Classroom Space.

The question of use of University rooms was recently raised, and as no record of earlier studies could be discovered. I undertook to make an analysis of classroom utilization during the present (Spring) quarter, for a total of 47 rooms in Cobb, Harper, Classics, Commerce, Law, and Lexington, used for the most part by Arts and Literature departments and assigned through the Recorder's office. Of these 47 rooms, 26 are in Cobb, 7 in Classics, 6 each in Harper and Commerce, and one each in Law and Lexington. In the summary of the study which follows, the buildings are considered as units, although records in detail are available for each room in each building.

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The summary table attached gives the complete figures by buildings and in total, about which I make brief statements here. On a weekly basis, then, for the present quarter, the figures show for the buildings and 47 rooms studied:

(1) That the weekly use of total available hours (40 hours each for 47 rooms, or 1880 room hours) is 1078, or 57.34%. In Cobb Hall, however, the hourly utilization was 58.94%, Harper 59.58%, Classics 50.00%, Commerce 60.00%, one room each in Law and Lexington 57.50% and 37.50% respectively.

(2) That the proportion of scating capacity occupied in the rooms, on a weekly basis is 27.51% (of a scating capacity in 47 rooms totaling 2368 students, multiplied by 40 available hours weekly, equaling a total capacity weekly of 94270 student-hours.) In Cobb Hall alone the student-hour utilization is 28.02%, in Harper 30.25%, Classics 21.64%, Commerce 26.17%, one room in Law 36.68%, and one room in Lexington 22.50%.

If the use of Cobb Hall, for comparison, is taken to be a guide to desirable occupancy, then Harper is somewhat crowded, while Commerce and especially Classics are under-occupied. In Classics the cause of this low average is relatively smaller and fewer classes generally.

(3) That morning utilization is much more complete in all

- 2 -

Buch fow special classes as meet at 4:30 p.m. or later are counted, however, as afternoon classes within the sight hours. Distinction has been inde in the calculations for Junior college classes meeting five hours weekly, Senior college and Graduate classes meeting four hours weekly, and come few classes which meet for conference only two hours weekly.

The summary table attached gives the complete figures by buildings and in total, about which I make brief statements here. On a weekly boois, then, for the present quarter, the figures show for the buildings and 47 rooms studied:

(1) That the weekly use of total available hours (40 hours each for 47 rooms, or 1880 room hours) is 1078, or 57.345. In Gobb Hall, however, the hourly utilization was 58.945, Harper 59.585, Classics 50.00%, Commerce 60.00%, one room each in law and Lexington 57.50% and 37.50% respectively.

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(1) What morning utilization is much more complete in all

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buildings studied, both as to hours and as to capacity, than afternoon utilization. Considering 20 morning and 20 afternoon hours weekly (4 each day in 5 days), the morning occupancy in these buildings is 73.6% of the available morning room-hours, and 41.0% of the available room-hours in the afternoon. For Cobb Hall the figures are 74.0% and 43.8%, for Harper 72.5% and 46.6%, for Classics 73.6% and 26.4%, for Commerce 78.3% and 41.6%, morning and afternoon respectively.

As to capacity utilization morning and afternoon, in student hours weekly, the total for 47 rooms shows morning occupancy to be 42.40% and afternoon 12.62% of capacity. In the various buildings, Cobb Hall percentages are 42.78% mornings and 13.26% afternoons; Harper 49.56% and 10.94%; Classics 34.68% and 8.60%; Commerce 38.28% and 14.06%. It should be noted that the use of Harper M-11 (Lecture Room) for lecture purpœes averages about two hours weekly, but only the classroom use of that room is figured into these percentages.

The details of the analysis appear in the condensed tables accompanying this statement, and the analysis of each room is available in the working sheets if it is desired.

It is interesting to add the following averages for this comparison: That the average capacity of the 47 classrooms here studied is 54, and that the average size of classes in them in the Spring quarter is less than half the capad ty or 23.7 (251 classes with a total attendance of 5950 students).

A special computation for the nine classrooms on the fourth floor of Cobb Hall is also interesting. They have a total capacity of 408 students. Of the weekly room-hours available (9 rooms at 40 hours a week, or 360), they were used 40% of the time, as com-

- 3 -

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A special computation for the mine classrooms on the fourth floor of Gobb Hall is also interesting. They have a total capacity of 403 students. Of the weekly room-hours available (9 rooms at 40 hours a week, or 360), they were used 40% of the time, as com-

- 8 -

par, with 53.94% in Cobb Hall as a whole, and 57.34% in the 47 roomsstudied. In seating capacity weekly, 3008 out of 16320 student-hours were utilized, or 18.4%, as compared with 28.02% in Gobb Hall as a whole, and 27.51% in the 47 rooms studied. In the morning hours they were occupied 63.3% of the time, in the afternoon 15.5% of available time, as compared with 74.0% and 43.8% for Cobb as a whole, and 73.6% and 40.5% of hours, morning and afternoon respectively, for the 47 rooms studied. Undoubtedly these rooms, of good size, averaging 45 seats each, are handicapped by their height above ground and find inadequate use for that reason particularly, especially in the Spring quarter. None of them is occupied at the 8-9 hour, none after 2:30, except one class for one hour daily at 2:30 this quarter.

In considering the percentages of use here revealed, the fact that a Spring quarter has been studied indicates that the use of rooms, so far as student registration is a factor, is probably at its lowest quarterly figure for the academic year, if this Spring quarter may be taken as typical; and therefore the figures represent the lightest quarterly demands made on classroom space in the year. Secondly, the fact that Arts and Literature classroom use has been studied may be taken as representative of Arts and Literature in general, but cannot be taken as an indication of percentage use of laboratory space in scientific buildings or of other classroom space in the professional schools. But the study of such important buildings as Cobb, Harper, Classics and Commerce covers a group of the most used classrooms for a large share of the quarterly University registration, and thus applies to some of the most significant space on the quadra gles.

- 4 -

part with 58.94% in Cobb Hall as a whole, and 57.34% in the 47 roemstudied. In seating capacity weekly, 3008 out of 16320 student-houre were utilized, or 18.4%, as compared with 28.02% in Cobb Hall as a whole, and 27.51% in the 47 rooms studied. In the morning hours they were occupied 63.3% of the time, in the afternoon 15.5% of available time, as compared with 74.0% and 43.8% for cobb as a whole, and 73.6% and 40.5% of hours, morning and afternoon good size, averaging 45 seats each, are handicapped by their of good size, averaging 45 seats each, are handicapped by their theight above ground and find inadequate use for that reason partioularly, sepecially in the Spring quarter. Hone of them is occupied at the 8-9 hour, none after 2:30, except one class for one hour daily at 2:30 this quarter.

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- 5 -

SUMMARY: Unless this Spring quarter cannot be interpreted as typical of Spring quarter Arts and Literature classes, this space utilization study indicates little better than half use of hourly the weekly, and little better than quarter use of capacity weekly. with a roally inadequate use of afternoon hours and space generally. Any question of orowding them ought readily to find some remody in acte careful assignment of roome by size, or better application of afternoon hours. It is clear, too, that for the Spring quarter tas average size of classroom is more than twice the average need of sesting space par class.

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I. SUMMARY OF WHERLY CLASSROOM USE IN 47 ROOMS - SPRING QUARTER, 1926

Classrooms		Total Weekly Use Hourly of Capacity Available Room-Hours		Percentage of Hourly Use	Weekly Use of Available Capacity in Student-Hours	Percentage of Student Capacity Uses
Cobb Hall	26 rooms	1314	613 of 1040	58.9	14726 of 52560	28.0
Harper	6 *	372	143 * 240	59.6	4501 * 14880	30.3
Classics	7 .	286	140 * 280	50.	2476 * 11440	21.6
Commerce	6 *	292	144 * 240	60.	3057 * 11680	26.2
Law, West	1 room	64	23 ** 40	57.5	939 ° 2560	36.7
Lexington	1 *	40	15 " 40	37.5	360 * 1600	22.5
Totals	47 rooms	2368	1078 * 1880	57.3	26059 * 94720	27.5

11. SUBMARY OF VEEKLY CLASSROOM USE, MORNING VE. AFTERNOON HOURS IN 47 ROOMS, SPRING QUARTER, 1926

		R	Student-Hour Use								
Class	COOMB	* Available Hours	Used A.M.	%	Used P.M.	%	* Available Rours	Used A.M.	Z	Used P.M.	z
Cobb Hall	26 room	s 520	385	74.0	228	43.8	26280	11243	42.8	3483	13.3
Harper	6 "	120	87	72.5	56	46.6	7440	3687	49.5	814	10.9
Classics	7 =	140	103	73.6	37	26.4	5720	1984	34.7	492	8.6
Connerce	6 *	120	94	78.3	50	41.6	5840	2235	38.3	822	14.1
Law, WEst	1 room	20	18	90.0	5	25.0	1280	803	62.7	136	10.6
Lexington	1 0	20	5	25.0	10	50.0	800	135	16.9	225	28.1
Totals	47 room	s 920	692	73.6	386	41.0	47360	20087	42.4	5972	12.6

* Available each morning and afternoon, weekly.

I. SUMMARY OF VERICE CLASSROOM USE IN 47 ROOMS - SERIES QUARTER, 1926

Percentage of Stuient Capacity Deed	Veckly Use Veckly Use Capacity in Student-Howrs		Weekly Use Fercentage of of Avallable Hourly Room-Houre Use			Total Hourly Caracity		800 0	Olastro one		
28.0	of 52560	14726	58.9	1040	20	613	1314	attoor	26	Cobb Hall	
80.3	* 14880	4501	59.6	240		143	372	ŧ	9	moral	
21.6	* 11440	2476	50.	280		140	236		7	Classics	
26.2	* 11630	3057	.03	240	-	144	SPS	п	9	Comerce	
36.7	* 2560	939	57.5	40	-	23	64	noon	1	law, West	
22.5	* 1600	360	37.5	40		15	40		1	Lagington	
27.5	* 94720	26059	57.3	1000	12	1073	2368	TOOMS	47	Totala	

IT. SUMMARY OF VERHIEV GLASSROOM USE, MORNING VS. AFTERNOOM HOURS IN 47 ROOMS, SIRING QUARTER, 1926

			l-dashu				osu · r	noH-mo	RO			
Z	Dood .N.L	8	Deed .M.A	efdefteva *	. X	Used P.M.	R	Used. A.M.	Available Roure		affoo	Glassr
13.3	3483	42.8	11243	26280	43.8	228	74.0	385	520	5000°Z	26	Cobb Hall
10.9	814	49.5	3687	7440	46.6	56	72.5	87	120		9	Harper
9*8	492	34.7	1984	5720	26.4	37	73.6	103	140		7	Glassics
14.1	822	38.3	2235	5840	41.6	50	78.3	94	120		6	Commerce
10.6	136	62.7	803	1280	25.0	5	90.0	81	20	room	1	jaEW, WAI
28.1	225	16.9	135	008	50.0	10	25.0	3	20		1	lexington
12.6	\$972	42.4	20097	47360	41.0	386	13.6	692	920	8200X	47	Totala

* Available each morning and afternoon, weekly.

The University of Chicago

Office of the Recorder and Examiner

June 18, 1926.

Dean F. C. Woodward, Harper Memorial Library.

My dear Dean Woodward:

I return herewith, as per your request, the report of Mr. Allin-Smith on "Utilization of Classroom Space". I have no doubt of the accuracy of the report, except on one or two points which do not affect the principle at The thing which is not commented on issue. is that our space is used to the limit at nine and ten o'clock and almost to the limit at eleven o'clock, - in other words that our peak load taxes our capacity. The problem, as I see it, is the more even distribution of our total load throughout the available hours of the day. Most of our students would, if they could, elect all three of their courses at nine, ten and eleven and the preference of a large number of our departments is appa rently in harmony with the preference of our students.

This question of a more even distribution of our load throughout the day has often been made the subject of discussion and to a certain extent of administrative action. By action of the General Administrative Board (April 17, 1920) the following recommendation was adopted:

1- That it is necessary to schedule in the afternoon hours (a) in the case of Junior College work and (b) in the case of Senior College work not less than 40% nor more than 60% of the sections offered by each department.

Not all of the departments act in harmony with this request, but even so, it would not totally solve our problem. Personally, I should be glad to see a larger amount of pressure brought to bear upon departments; believing that the students would accomodate themselves to the programs announced by the University.

Yours very truly, Mora

The University of Chicago

Olice of the Receiver and Examinat

Harper Memorial Library.

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The University of Chicago The Ogden Graduate School of Science June 17, 1926

Make new file : --University Survey

OFFICE OF THE DEAN

Mr. W. E. Scott Office of the President

Dear Mr. Scott:

I am interested in the report of Mr. Allin-Smith on the "Utilization of Classroom Space". It seems to me almost inexcusable that the University should spend money to demonstrate that there is plenty of space in the Spring Quarter. We all know that congestion is at a minimum at that time of the year; and we also know that practically all of the rooms considered are vacant at the 12:30 hour. In fact, only six of these rooms are used at 12:30 during the Autumn Quarter, our most congested period. There was, I believe, one room vacant through a combination of misunderstanding between Mr. Payne and myself as to the availability of this room for office space -end, the unexpected discontinuation of one course and through the transfer to one of the outlying laboratories of courses which should naturally have been in Cobb Hall. If studies of this sort are to be made, it would be very much more valuable to us to have them made during the Autumn Quarter which is the most congested period rather than for the Spring Quarter which is the least congested period.

I happen to know that in the preceding Autumn Quarter there was not a single room available of the forty-seven considered at 9:00 Che University of Chicago . Che Ogden Ocadante School of Science June 17, 1936

> Mr. V. E. Socti Office of the Prosides

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I bappen to know that in the preceding Autumn Quarter there are not a single room available of the forty-acres considered at 9:00 Mr. W. E. Scott #2

or 10:00 and only two at 11:00. The studies with reference to the size of classes and the seating capacities of the rooms seem to me a complete waste of time. It is inevitable that we should have some small classes, and it would not be practicable to supply small rooms for all of the small classes. It certainly would be an unwise educational policy to offer only courses which would fill the available classrooms.

I cannot help feeling that it gives an absolutely false impression of our needs to take seriously a report which appears on the surface to indicate that we are only using three-fourths of our available classroom space.

Very truly yours,

Huryls Gale

HGG:M

Henry G. Gale Dean.

Mr. W. E. Scott #2

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Humple Gale

M:DOH

Henry G. Gale Desn.

Very truty yours;

Memorandum to President Mason and Mr. Woodward

From Mr. Allin-Smith

Subject: Sample Portfolio of Departmental Records.

In connection with the General Education Board survey, I submit for inspection and criticism a collection of significant departmental records which we have called a portfolio. It is arranged for cumulative entry up to 1930 and standardized in forms so that portfolios in similar style may be prepared for each or any separate University department.

I should like this sample, which covers the records of the Department of Mathematics, to have your consideration, especially with reference to its continued utility to the administrative officers of the University. For such a broad purpose, the portfolio should be characterized by <u>Clearness</u>, <u>Completeness of</u> <u>Essential Details</u>, <u>Ease of Cumulative Entry</u>, <u>Expansibility</u>. Viewed with such characteristics in mind, it may appear that other records should be added or substituted; that slightly different form or arrangement should be given to the details shown; that emphasis ought to be placed on particular features. In any case, the scheme allows readily for cumulation of data quarter by quarter, and for the addition at any time of other special features of departmental activities that may come to have the greatest reference value. Keeping these studies up to date will not be more than a clerical effort of a few days quarterly, which need not constitute a burden of office routine.

PURPOSE: The intention of the portfolio is to separate from general University records and to arrange the distinctly departmental records which may be useful in administrative control. Many major considerations of plan or policy in administration relate themselves directly to the scope or operation of a given University department, apart from their incidental relationship to the University organization as a whole. In those matters the departmental records should be accessible, as such. Quantities of statistical information about the growth of University activities exist in varied form and scattered location. So far as I am able to discover, however, there never has been a sustained attempt to construct from the several sources a systematic record of activities in separate departments and from the departmental point of view.

For much of the portfolio it has seemed unwise to accumulate details prior to the year 1922-23, the last of Doctor Judson's administration, both because it would take considerable time and because experience of earlier years probably has little bearing on the situation in which University administration now finds itself. 19 May 1926.

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-2-

- I. Departmental Records, containing statistics and charts concerning degrees, registration, teaching ranks, courses given, and instruction costs; and
- II. <u>Staff Re cords</u>, containing statements of training, promotion, salary, activities in and out of the University, research and publications, for each present member of the departmental teaching staff.

The table of contents shows the order of these items. A brief discussion of each section follows:

I. The departmental statistics will contain, if continued, a cumulative record of the trend for several years. As a means of administrative control much of the information leads finally to a consideration of the budget and of costs of instruction. As the tabular statistics explain themselves fairly well, attention is given here primarily to the item of costs. These fiscal records appear in Section I on pages 7-9. So far, cost studies have been completed for only one year, 1924-25. To this will be added unit costs for 1922-23 and for the current year 1925-26 as each department is analyzed. The value of these records grows as they accumulate for quarterly comparison, so that they should continue for some future periods to establish reliable norms or ratios. Moreover, the greatest value will attach to comparison of one department or group of departments with others, and of single departments with the University as a whole, when complete studies are available.

In brief explanation of Mathematics costs as they appear in Table I-8 and Chart I-9, I should like to point out one or two possibilities of administrative utility. For Mathematics the quarterly relationship is set up clearly as between the unit costs per student-major of teaching graduate, senior, junior and other groups, comparing them as well with the average costs in the whole department and in the entire intra-mural University during 1924-25.

In the chart, the groups of vertical ribbons represent the dollar costs during separate quarters of the years noted, comparing average cost of instruction quarterly in each group. The yearly average is shown by short horizontal lines in identifying color cutting across the four quarters in each year. The 1924-25 yearly average for the entire University appears in a horizontal green line cutting across each classification group.

It will be seen that Graduate costs per student-major increased between 1922-23 and 1924-25, but quarterly in 1925-26 up to the Spring quarter they appear to be lower than in either earlier year. In contrast, Senior and Junior average costs show considerable declines since 1922-23. Table I-4 will show ARRANGHMENT: The portfolio has two parts,

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Whether this is justifiable in the circumstances or should continue, is but one of the considerations of administrative policy which departmental portfolios should reveal.

Looking at the total Mathematics registration on the chart, with these costs tendencies in mind, the weight of preponderant graduate registration has carried the average cost up between 1922-23 and 1924-25; in contrast, however, with lower levels each quarter so far in 1925-26.

As compared with University average costs (horizontal green line) for 1924-25, the Mathematics yearly averages (short horizontal colored lines for each year) show somewhat better dollar grades of instruction throughout. All these instruction cost figures find their best ready comparison with the amounts which students paid for each major, graduates \$20.00 and undergraduates \$20.00 to \$25.00 quarterly.

In concluding this brief statement concerning Section I, attention is called to the summary page I-10 inserted for the addition of comments or notes from time to time that will serve to give a better interpretation of the cumulative records.

II. Within the section on Staff it is intended to include all those items of personal record which will come to serve as a convenient and reliable grading of academic standing for each faculty member, whether for purposes of salary, promotion, or any general question of effectiveness.

Page 3 in each individual record shows the courses given and registration from the Summer quarter 1922 to date. It will be an indication of the classification of courses taught, the size of classes, the extent of quarterly teaching above or below two majors, the quarters out of residence, among other things. The item of costs appears here again, also in the form of an average per student-major, for each course given. This record, if maintained, will have a considerable bearing on the question of continuing the consistently high-cost courses within each department, or on the parts of particular instructors.

All these and other matters may well be discussed in your determination of the utility of a portfolio record for each that graduate registration has increased substantially while other classes of students have had a declining tendency in several quarters. If the grade of instruction measured in total dollar costs has remained relatively the same, graduate costs would have declined by reason of greater attendance, and senior or junior costs either increased or remained stationhowever; and from these facts, even considering staff salary increases between those years (Table I-7), it would seem that the Mathematics Department has tended to give a better "dollar" grade of instruction to graduates at the expense of undergraduate instruction.

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All these and other matters may well be discussed in your determination of the utility of a portfolio record for each department. It is my understanding that the analysis of costs, such as was done for 1924-25 a year ago, falls within the purpose of the General Education Board contribution. The giving effect to University administrative controls which those cost studies show to be necessary, however, requires the broader understanding of departmental development which the portfolio of records is designed to provide. The cost studies could proceed separately, or the accumulation of records other than costs could proceed. But they have a joint utility. I raise the question then as to the next step. I should be pleased to consider this with you, or others at your direction.

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The University of Chicago CHICAGO, ILLINOIS Office of the President

3 May 1926.

Memorandum to Mr. Woodward

From Mr. Allin-Smith

In the light of our discussions about the survey during the past week, I have designed a series of forms for departmental records after investigation of information to be had, and now recommend the following program on which a survey might progress immediately:

(1) To analyze departmental records and tabulate the facts on prepared forms, standardized for all departments, along the lines of the suggested folder prepared for the Department of Mathematics; and

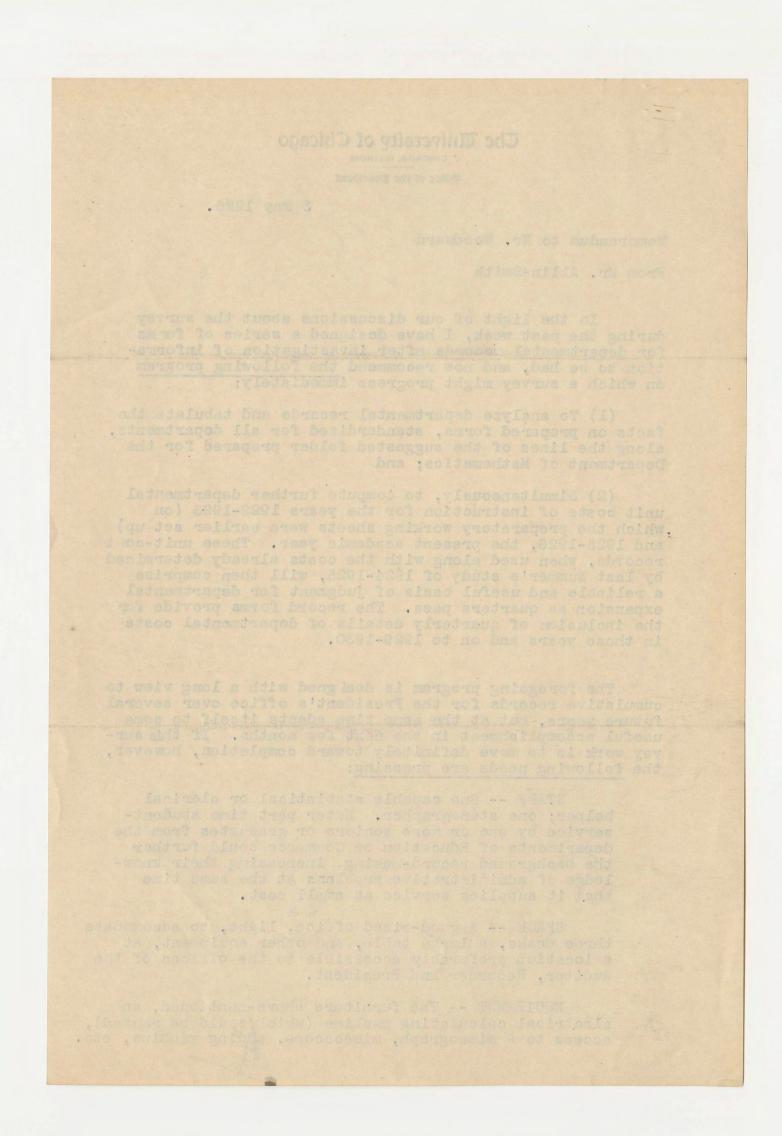
(2) Simultaneously, to compute further departmental unit costs of instruction for the years 1922-1923 (on which the preparatory working sheets were earlier set up) and 1925-1926, the present academic year. These unit-cost records, when used along with the costs already determined by last summer's study of 1924-1925, will then comprise a reliable and useful basis of judgment for departmental expansion as quarters pass. The record forms provide for the inclusion of quarterly details of departmental costs in those years and on to 1929-1930.

The foregoing program is designed with a long view to cumulative records for the President's office over several future years, but at the same time adapts itself to some useful accomplishment in the next few months. If this survey work is to move definitely toward completion, however, the following needs are pressing:

STAFF -- One capable statistical or clerical helper; one stenographer. Later part time studentservice by one or more seniors or graduates from the departments of Education or Commerce could further the background record-making, increasing their knowledge of administrative problems at the same time that it supplies service at small cost.

SPACE -- A good-sized office, light, to accompdate three desks, a large table, and other equipment, at a location preferably accessible to the offices of the Auditor, Recorder and President.

EQUIPMENT -- The furniture above-mentioned, an electrical calculating machine (which could be rented), access to a mimeograph, mimeoscope, adding machine, etc.



The University of Chicago

Office of the Vice=President and Business Manager

ROOM 1840, 230 S. CLARK ST. TELEPHONE DEARBORN 9312

> April Twenty Three 1 9 2 6

My dear Mr. Woodward:

Following my conference with you, Mr. Plimpton and Mr. Moulds yesterday, in pursuance to the conclusion which we reached, I discussed with Mr. Allin-Smith the question of his continuing the work on statistical matters relating to the survey and allied subjects. He informed me that he was willing to continue up to July 1, with the understanding that about that time the University would give him a definite answer as to whether he was to continue on a permanent basis, or whether the relationship should terminate. If the University should desire him to continue on a permanent basis, he would expect to have his standing recognized as an expert and his salary on the basis of \$5,000 from July 1.

There is no doubt in my mind that the University is greatly in need of services such as Mr. Allin-Smith can render; and it must look forward to having a staff of statisticians and fact finders who will be able to furnish the President and his administrative colleagues with such information.

Inasmuch as I shall not be at the University on July 1, I am writing this letter to you so that you may fully understand the situation and take such action with regard to it as is appropriate.

I am sending a copy of this letter to Mr. Allin-Smith, so that he will know just what the present arrangement is.

Very truly yours,

Trevor anell

Min. Surveys Stra Stra Stra

Trevor Arnett

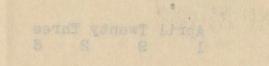
Mr. Frederic C. Woodward The University of Chicago

TA: EVB Copy to Mr. Allin-Smith

The University of Thicago

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Very truly yours

Trevor Arnett

Mr. Frederic C. Moodward The University of Chicago

TA: HIE Cosy to Mr. Allin-Smith

April 29, 1926

My dear Mr. Arnett:

The receipt of your letter of April 23, in which you set down the terms of your understanding with Mr. Allin-Smith, is acknowledged. The agreement with Mr. Allin-Smith seems to me a very satisfactory one and I am writing merely for the purpose of making your record complete.

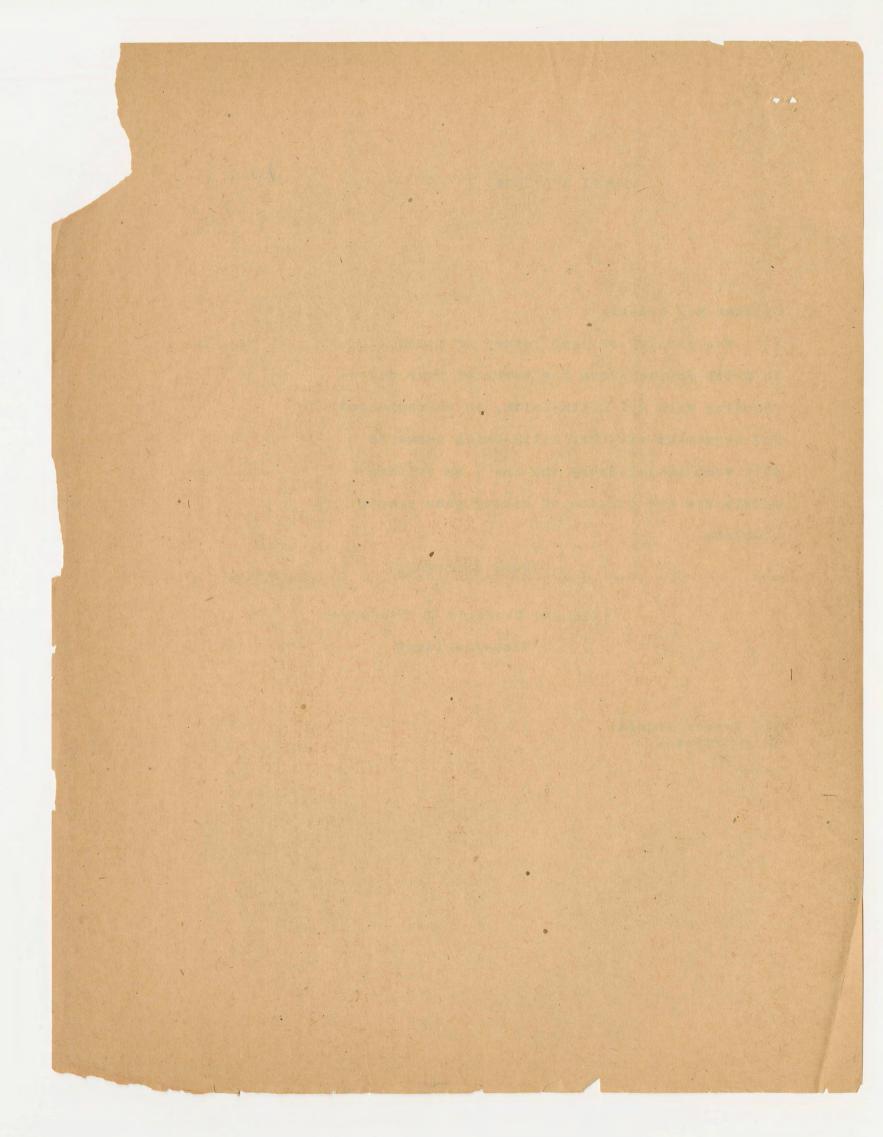
Yours sincerely,

(\$tgned) Frederic C. Woodward

Vice-President

Mr. Trevor Arnett City Office

FCW*L



Communication presented to the Board of Trustees on March 12,

1925:

Reference was made by the Business Manager in his docket for the Board meeting held January 8, 1925, to the desirability of undertaking, as soon as possible, the survey of the University for which an appropriation has been made by the General Education Board.

In the annual report of the General Education Board for the year 1923-24, which was published last week, occurs the following:

"The rapid increase of college and university funds, the expansion of academic facilities and opportunities, the rise in student enrollment, characteristic of the last two decades, have suggested the importance of a careful comparative study of these and other similar factors. Mr. Arnett's study of salaries should be brought up to date; a similar study should be made of students' fees; departmental developments and changes in the curriculum should be surveyed from the standpoint of their importance, cost, etc. It is worth inquiring what college training costs the institution and the student, within what limits these costs vary, and what relation can be discovered between expenditure and results. A comprehensive inquiry into these topics, including at the outset all or even many institutions would obviously be impracticable. But much may be learned from the examination of a single university. With this in mind, the board made an appropriation of \$25,000 to defray the expenses of conducting an inquiry into the educational and financial organization and administration of the University of Chicago, in the hope of thus working out a procedure which would aid college and university authorities generally in obtaining a clearer understanding of their problems.

"In this connection, it is interesting to quote a passage from a report by President Harper, made in 1902, at the close of the first decennium of the University:

"I desire at this point to express the hope that a similar report may be made by the officials of the University in connection with each decade of its progress. In these modern times ten years count for as much as one hundred years did formerly. It is worth the while of those engaged in any important undertaking, educational or otherwise, to sum up the results of the work accomplished in ten years, to consider the policies which have prevailed, and to decide whether, in view of all the facts, these policies have been correct and have secured the results desired. Moreover, it is to be remembered that many policies, at least those of minor importance, may wisely be changed from time to time even under the same administration; for a policy which may have been the best for a certain period may not be the best for another period. It has been customary in educational administration to wait for the change of an administration before introducing or adopting new policies. This is a mistake. The institution is thus too frequently compelled to wait a longer period than is wise. It may, of course, be difficult for an administration to adapt itself from time to time to changes, but, however, difficult this may be, it would seem to be upon the whole a wise policy. "

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The University of Chicago has grown very rapidly - practically doubling its enrollment, resources and expenditures every decade. Its organization and administration have not changed and developed to keep pace with this remarkable growth. It is on the eve of a still further expansion. There has been no fundamental change in the business organization since 1901 when the Comptroller's office was divided and two new offices - those of Business Manager and Auditor - created in its place. That arrangement was a distinct advance and has worked very well. But a much greater development has taken place in the University in the quarter century since that change was made than had occurred in the first decade of the University which preceded it, and the question arises whether the time is not more than ripe for a further division of the work and responsibilities. As matters stand at present, to take one instance only, the work of the Business Manager's office is so extensive that the Business Manager has no time or opportunity to supervise, direct and co-ordinate the work of the other administrative offices, as he is expected to do. The result is the University work is practically unsupervised, and friction and lack of harmony with the resulting waste and lack of esprit de corps prevail. Recently some improvement in the academic administration has taken place through the doubling of the number of deans.

The Vice-President and Business Manager has been giving much thought to this matter, and has conferred with the President of the Board and the President of the University, and with their concurrence and approval, begs to recommend that he be authorized by the Board to proceed at once, in co-operation with Vice-President Tufts, to make the survey financed by the General Education Board and devote the major part of his. time to it until it is completed, giving in the meantime such time as is necessary to the supervision of the work of the Business Manager's office.

There are numerous questions of policy and procedure which must be rightly solved in the immediate future, if the University is to maintain its reputation for good management, and it is hoped that the survey will be so thorough and productive that it will place all the facts of the situation so clearly before the Trustees that they will be enabled to take such action as will accomplish even greater good for the University than did the action taken twenty-five years ago, when the offices of the Business Manager and Auditor were created. The University of Chicago has grown very rapidly - practically doubling its enrollment, resources and expenditures every decade. Its organization and administration have not changed and developed to keep pace with this remarkable growth. It is on the eve of a still further expansion. There has been no fundamental change in the business organization since 1901 when the Comptroller's office was divided and two new offices - those of Business Manager and Auditor - created in its place. That arrangement was a distinct advance and has worked very well. But a much greater development has taken place in the University in the quarter century since that change was made than had occurred in the first decade of the University which preceded it, and the question arises whether the time is not more than ripe for a further division of the work and responsibilities. As matters stand at present, to take one instance only, the work of the Business Manager's office is so extensive that the Business Manager has no time or opportunity to supervise, direct and co-ordinate the work of the other administrative offices, as he is expected to do. The result is the University work is practically unsupervised, and friction and lack of harmony with the resulting waste and lack of esprit de corps prevail. Recently some improvement in the academic administration has taken place through the doubling of the number of deans. The Vice-President and Business Manager has been giving much

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