



CONSTRUCTION SCIENCE
TEXAS A&M UNIVERSITY

Summer 2018

Senior Exit Survey

n = 60

Student

**Self-Reported Confidence and Importance for
COSC Student Learning Outcomes**

Student Learning Outcomes

- Students' confidence in their ability to apply the Student Learning Outcomes (SLOs) **(Table 1)**

(Frequency counts for individual SLOs may be found in Table 3)

- Students indicated they were **"Very Confident"** in their ability to analyze professional decisions based upon ethical principles
- Students' indicated they were **"Confident"** in their ability to apply the remaining 19 SLOs
 - Top three SLOs students indicated they were **"Confident"** applying
 1. *"Create written communications appropriate to the construction discipline"*
 2. *"Apply construction management skills as a member of a multi-disciplinary team"*
 3. *"Create oral communications appropriate to the construction industry"*
- Students' perception of the importance of the Student Learning Outcomes (SLOs) in their future careers **(Table 2)**

(Frequency counts for individual SLOs may be found in Table 4)

- **14 of the 20** SLOs students indicated would be **"Very Important"** in their future careers
 - The top three SLOs student perceived as **"Very Important"**
 1. *"Apply construction management skills as a member of a multi-disciplinary team"*
 2. *"Create written communications appropriate to the construction discipline"*
 3. *"Analyze construction documents for planning and management of construction processes"*
- The remaining 8 SLOs were perceived as being only **"Important"** to students' future careers

Table 1. Summer 2018: Mean Score of Students' Response to the Question: "As a result of your COSC degree program, how confident do you feel in your ability to:"

SLO #	Student Learning Outcome	n	M	SD	Confidence
6.	Analyze professional decisions based upon ethical principles	60	3.75	.44	Very Confident
1.	Create written communications appropriate to the construction discipline	60	3.50	.60	Confident
9.	Apply construction management skills as a member of a multi-disciplinary team	60	3.50	.57	Confident
2.	Create oral communications appropriate to the construction industry	60	3.47	.62	Confident
7.	Analyze construction documents for planning and management of construction processes	60	3.37	.69	Confident
8.	Analyze methods, materials, and equipment used to construct projects	60	3.33	.68	Confident
16.	Understand construction project control processes	60	3.32	.62	Confident
15.	Understand construction quality assurance and control	60	3.32	.60	Confident
12.	Understand different methods of project delivery and the roles and responsibilities of all constituencies involved in the design and construction process	60	3.25	.63	Confident
10.	Apply electronic-based technology to manage the construction process	60	3.25	.70	Confident
13.	Understand construction risk management	60	3.23	.65	Confident
14.	Understand construction accounting and cost control	60	3.17	.67	Confident
17.	Understand the legal implications of contract, common, and regulatory law to manage a construction project	60	3.10	.73	Confident
11.	Apply basic surveying techniques for construction layout and control	60	3.05	.77	Confident
18.	Understand the basic principles of sustainable construction	60	2.98	.68	Confident
20.	Understand the basic principles of mechanical, electrical and piping systems	60	2.97	.86	Confident
3.	Create a construction project safety plan	60	2.93	.84	Confident
5.	Create construction project schedules	60	2.82	.91	Confident
4.	Create a construction project cost estimate	60	2.80	.94	Confident
19.	Understand the basic principles of structural behavior	60	2.75	.93	Confident

Note: Very Confident = 3.51 – 4.00; Confident = 2.51 – 3.50; Somewhat Confident = 1.51 – 2.50; Not Confident = 1.00 – 1.50

* Number of participants who answered "Don't Know" were excluded from calculation of Importance Level.

Table 2. Summer 2018: Mean Score of Students' Response to the Question: "How important do you believe each of the following will be in your future career?"

SLO #	Student Learning Outcome	n	M	SD	Importance
9.	Apply construction management skills as a member of a multi-disciplinary team	58	3.69	.54	Very Important
1.	Create written communications appropriate to the construction discipline	58	3.69	.54	Very Important
7.	Analyze construction documents for planning and management of construction processes	58	3.69	.54	Very Important
2.	Create oral communications appropriate to the construction industry	58	3.67	.57	Very Important
8.	Analyze methods, materials, and equipment used to construct projects	58	3.66	.55	Very Important
16.	Understand construction project control processes	58	3.64	.55	Very Important
6.	Analyze professional decisions based upon ethical principles	58	3.64	.61	Very Important
13.	Understand construction risk management	58	3.60	.59	Very Important
15.	Understand construction quality assurance and control	58	3.60	.59	Very Important
14.	Understand construction accounting and cost control	57	3.60	.62	Very Important
10.	Apply electronic-based technology to manage the construction process	58	3.57	.60	Very Important
5.	Create construction project schedules	58	3.57	.62	Very Important
17.	Understand the legal implications of contract, common, and regulatory law to manage a construction project	58	3.57	.65	Very Important
12.	Understand different methods of project delivery and the roles and responsibilities of all constituencies involved in the design and construction process	58	3.52	.60	Very Important
4.	Create a construction project cost estimate	58	3.48	.71	Important
20.	Understand the basic principles of mechanical, electrical and piping systems	58	3.45	.65	Important
3.	Create a construction project safety plan	58	3.43	.75	Important
18.	Understand the basic principles of sustainable construction	58	3.41	.75	Important
19.	Understand the basic principles of structural behavior	58	3.17	.98	Important
11.	Apply basic surveying techniques for construction layout and control	58	2.93	.95	Important

Note: Very Important = 3.51 – 4.00; Important = 2.51 – 3.50; Somewhat Important = 1.51 – 2.50; Not Important = 1.00 – 1.50

* Number of participants who answered "Don't Know" were excluded from calculation of Importance Level.

Table 31. Summer 2018: Student Responses to the Question: “As a result of your COSC degree program, how confident do you feel in your ability to:”

n = 60

		Very Confident		Confident		Somewhat Confident		Not Confident	
SLO #	Student Learning Outcomes	<i>f^a</i>	%	<i>f^a</i>	%	<i>f^a</i>	%	<i>f^a</i>	%
6.	Analyze professional decisions based upon ethical principles	45	75.0	15	25.0	--	--	--	--
1.	Create written communications appropriate to the construction discipline	33	55	24	40.0	3	5.0	--	--
9.	Apply construction management skills as a member of a multi-disciplinary team	32	53.3	26	43.3	2	3.3	--	--
2.	Create oral communications appropriate to the construction industry	32	53.3	24	40.0	4	6.7	--	--
7.	Analyze construction documents for planning and management of construction processes	27	45.0	30	50.0	1	1.7	2	3.3
8.	Analyze methods, materials, and equipment used to construct projects	27	45.0	26	43.3	7	11.7	--	--
16.	Understand construction project control processes	24	40.0	31	51.7	5	8.3	--	--
15.	Understand construction quality assurance and control	23	38.3	33	55.0	4	6.7	--	--
10.	Apply electronic-based technology to manage the construction process	23	38.3	30	50.0	6	10.0	1	1.7
12.	Understand different methods of project delivery and the roles and responsibilities of all constituencies involved in the design and construction process	21	35.0	33	55.0	6	10.0	--	--
13.	Understand construction risk management	21	35.0	32	53.3	7	11.7	--	--
14.	Understand construction accounting and cost control	19	31.7	32	53.3	9	15.0	--	--
17.	Understand the legal implications of contract, common, and regulatory law to manage a construction project	19	31.7	28	46.7	13	21.7	--	--
11.	Apply basic surveying techniques for construction layout and control	18	30.0	28	46.7	13	21.7	1	1.7
20.	Understand the basic principles of mechanical, electrical and piping systems	18	30.0	25	41.7	14	23.3	3	5.0
3.	Create a construction project safety plan	16	26.7	27	45.0	14	23.3	3	5.0
5.	Create construction project schedules	15	25.0	24	40.0	16	26.7	5	8.3
4.	Create a construction project cost estimate	15	25.0	24	40.0	15	25.0	6	10.0
18.	Understand the basic principles of sustainable construction	13	21.7	33	55.0	14	23.3	--	--
19.	Understand the basic principles of structural behavior	13	21.7	26	43.3	14	23.3	7	11.7

Note: ^aFrequencies may not total stated *n* because of missing data.

Table 42. Summer 2018: Student Responses to the Question: “How important do you believe each of the following Student Learning Outcomes will be in your future career?”

n = 60

		Very Important		Important		Somewhat Important		Not Important	
SLO #	Student Learning Outcomes	<i>f^a</i>	%	<i>f^a</i>	%	<i>f^a</i>	%	<i>f^a</i>	%
1.	Create written communications appropriate to the construction discipline	42	70.0	14	23.3	2	3.3	--	--
9.	Apply construction management skills as a member of a multi-disciplinary team	42	70.0	14	23.3	2	3.3	--	--
7.	Analyze construction documents for planning and management of construction processes	42	70.0	14	23.3	2	3.3	--	--
2.	Create oral communications appropriate to the construction industry	42	70.0	13	21.7	3	5.0	--	--
6.	Analyze professional decisions based upon ethical principles	41	68.3	13	21.7	4	6.7	--	--
8.	Analyze methods, materials, and equipment used to construct projects	40	66.7	16	26.7	2	3.3	--	--
16.	Understand construction project control processes	39	65.0	17	28.3	2	3.3	--	--
15.	Understand construction quality assurance and control	38	63.3	17	28.3	3	5.0	--	--
13.	Understand construction risk management	38	63.3	17	28.3	3	5.0	--	--
17.	Understand the legal implications of contract, common, and regulatory law to manage a construction project	38	63.3	15	25.0	5	8.3	--	--
14.	Understand construction accounting and cost control	38	63.3	15	25.0	4	6.7	--	--
5.	Create construction project schedules	37	61.7	17	28.3	4	6.7	--	--
10.	Apply electronic-based technology to manage the construction process	36	60.0	19	31.7	3	5.0	--	--
4.	Create a construction project cost estimate	35	58.3	16	26.7	7	11.7	--	--
12.	Understand different methods of project delivery and the roles and responsibilities of all constituencies involved in the design and construction process	33	55.0	22	36.7	3	5.0	--	--
3.	Create a construction project safety plan	33	55.0	18	30.0	6	10.0	1	1.7
18.	Understand the basic principles of sustainable construction	33	55.0	16	26.7	9	15.0	--	--
20.	Understand the basic principles of mechanical, electrical and piping systems	31	51.7	22	36.7	5	8.3	--	--
19.	Understand the basic principles of structural behavior	29	48.3	14	23.3	11	18.3	4	6.7
11.	Apply basic surveying techniques for construction layout and control	21	35.0	15	25.0	19	31.7	3	5.0

Note: ^aFrequencies may not total stated *n* because of missing data.

