

Table for Problem 30

ACTIVITY	IMMEDIATE PREDECESSORS	STANDARD TIME (WEEKS)	STANDARD COST	CRASH TIME (WEEKS)	CRASH COST
A	—	3	\$1,000	2	\$1,600
B	—	2	\$2,000	1	\$2,700
C	—	1	\$300	1	\$300
D	A	7	\$1,300	3	\$1,600
E	B	6	\$850	3	\$1,000
F	C	2	\$4,000	1	\$5,000
G	D, E	4	\$1,500	2	\$2,000

Table for Problem 31

ACTIVITY	IMMEDIATE PREDECESSORS	STANDARD TIME (DAYS)	STANDARD COST	CRASH TIME (DAYS)	CRASH COST
A	—	4	\$2,000	2	\$2,600
B	A	6	\$3,500	5	\$4,300
C	A	8	\$3,300	6	\$3,900
D	B	5	\$1,200	4	\$1,800
E	C, D	3	\$1,700	2	\$2,200
F	E	7	\$2,200	5	\$3,600
G	E	5	\$ 900	4	\$1,550
H	F, G	4	\$1,200	3	\$1,700

Table for Problem 32

ACTIVITY	IMMEDIATE PREDECESSORS	STANDARD TIME (DAYS)	STANDARD COST	CRASH TIME (DAYS)	CRASH COST
A	—	7	\$2,000	5	\$ 3,500
B	A	10	\$3,000	8	\$ 4,700
C	A	8	\$3,400	7	\$ 3,700
D	C	6	\$1,600	4	\$ 2,600
E	C	7	\$1,900	4	\$ 4,000
F	D, E	5	\$1,200	3	\$ 2,800
G	B, C	11	\$8,200	8	\$10,900
H	F, G	4	\$2,600	3	\$ 3,800

- 33 Software Development Specialists (SDS) is involved with developing software for customers in the banking industry. SDS breaks a large programming project into teams that perform the necessary steps. Team A is responsible for going from general systems design all the way through to actual systems testing. This involves 18 separate activities. Team B is then responsible for the final installation.

To determine cost and time factors, optimistic, most likely, and pessimistic time estimates have been made for all of the 18 activities involved for team A.

The first step that this team performs is general systems design. The optimistic, most likely, and pessimistic times are 3, 4, and 5 weeks. Following this, a number of activities can begin. Activity 2 is involved with procedures design. Optimistic, most likely, and pessimistic times for completing this activity are 4, 5, and 12 weeks. Activity 3 is developing detailed report designs. Optimistic, most likely, and pessimistic time estimates are 6, 8, and 10 weeks. Activity 4, detailed forms design, has optimistic, most likely, and pessimistic time estimates of 2, 5, and 5 weeks.