

PSP2 Project Summary Form Directions Planning Phase

Follow these directions during the planning phase to compute the project estimates.

#	Field Name	Directions
1	Programmer	Enter your name
2	Program ID	Enter the identifier of this program.
3	Program	Enter the name or title of the program or module.
4	Date	Enter today's date
5	Program Size (LOC) – Est.	Enter the program size estimate (LOC) from the Estimating Worksheet.
6	LOC/Hour - Est.	Find the To Date LOC/hour from the most recent previous program. Use this as the Est. LOC/hour for this program.
7	Defects/KLOC - Est.	Find the To Date Defects/KLOC on the most recent previous program. Use this as the Est. Defects/KLOC for this program.
8	Yield - Est.	Enter the To Date Yield from the most recent previous program.
9	A/F ratio - Est.	Enter the To Date A/F ratio from the most recent previous program.
10	Total Time – Est.	Divide Est. Program Size (5) by Est. LOC/Hour (6) and multiply by 60.
11	Time In Phase - Est.	Distribute the Est. Total Time over all the project phases: Multiply Est. Total Time (10) by the To Date % Time in Phase for each phase in the most recent previous program, divided by 100. Round to nearest minute.
12	Total Defects Injected - Est.	We estimate the total number of defects to be injected in the program by multiplying Est. Defects/KLOC (7) times the Est. Program Size (5) divided by 1000. For example, with a Est. Defects/KLOC of 75.9 and a Est. Program Size of 75, Est. Total Defects Injected = $75.9 \times 75 / 1000 = 5.69$, so use 6.
13	Defects Injected in Phase – Est.	Distribute the Est. Total Defects over all the project phases: Multiply Est. Total Defects (12) by the To Date % Defects Injected in Phase for each phase in the most recent previous program, divided by 100.
14	Total Defects Removed – Est.	Copy the value from (12), Est. Total Defects.
15	Defects Removed in Phase – Est.	Distribute the Est. Total Defects over all the project phases: Multiply Est. Total Defects (14) by the To Date % Defects Removed in Phase for each phase in the most recent previous program, divided by 100.
16		(Reserved for future use.)
17		(Reserved for future use.)

PSP2 Project Summary Form Directions PostMortem Phase

Follow these directions during the postmortem phase to compute the project statistics.

#	Field Name	Directions
18	Time In Phase Actual	At project completion, enter the actual time in minutes spent in each development phase. Get these data from the Time Recording Log. Postmortem time is time spent completing this Summary Form. You'll have to guess in order to have a value to enter in the field.
19	Total Time Actual	Calculate the sum of the times for all phases (18) and enter the sum here.
20	Time In Phase To Date	For each phase, add Actual Time (18) to the To Date Time from the most recent previous program, and enter the sum here.
21	Total Time – To Date	Add Total Actual Time (19) to the Total To Date Time from the most recent previous program, and enter the sum here. Check: Calculate the total of the individual To Date times (20) for all the phases.
22	Time In Phase To Date %	For each phase, enter 100 times the To Date time for that phase (20) divided by the Total To Date time (21). Round to one decimal place.
23	Total Time - To Date %	Sum the individual To Date % for all the phases (23). Verify that the total is 100%. Enter 100 here.
24	Defects Injected in Phase – Actual	At project completion, enter the actual number of defects injected in each development phase. (Get these data from the Defect Recording Log.)
25	Total Defects Injected – Actual	Calculate the sum of the Defects for all phases (24) and enter the sum here.
26	Defects Injected in Phase – To Date	For each phase, add Actual Defects Injected (24) to the To Date Defects from the most recent previous program, and enter the sum here.
27	Total Defects Injected – To Date	Add Total Defects Injected (31) to the Total To Date Defects from the most recent previous program, and enter the sum here. Check: Calculate the total of the individual To Date Defects (26) for all the phases.
28	Defects Injected in Phase – To Date %	For each phase, enter 100 times the To Date Defects for that phase (26) divided by the Total To Date Defects (27).
29	Total Defects Injected - To Date %	Sum the individual To Date % for all the phases (28). Verify that the total is within 1% of 100%. Enter 100 here.
30	Defects Removed in Phase – Actual	At project completion, enter the actual number of defects removed in each development phase. (Get these data from the Defect Recording Log.)
31	Total Defects Removed – Actual	Calculate the sum of the Defects for all phases (30) and enter the sum here. Check: This sum should be the same as Total Defects Injected (25).

32	Defects Removed in Phase – To Date	For each phase, add Actual Defects Removed (30) to the To Date Defects Removed from the most recent previous program, and enter the sum here.
33	Total Defects Removed – To Date	Add Total Defects Removed (31) to the Total To Date Defects from the most recent previous program, and enter the sum here. Check: Calculate the total of the individual To Date Defects (32) for all the phases.
34	Defects Removed in Phase – To Date %	For each phase, enter 100 times the To Date Defects for that phase (32) divided by the Total To Date Defects (33).
35	Total Defects Removed - To Date %	Sum the individual To Date % for all the phases (34). Verify that the total is 100%. Enter 100 here.
36	Actual Defects Removed – After Development	Enter here any defects found and removed during product release. (That is, any time after you judge development is complete, including formal acceptance testing).
37	To Date Defects Removed – After Development	When a defect is discovered after finishing this form, it is necessary to recalculate the To Date Release Defects for ALL SUBSEQUENT project summary forms.
38	Program Size (LOC) – Actual	Count the actual Lines of Code you wrote, using your Line Counting Standard.
39	Program Size (LOC) – To Date	Add Actual Program Size (38) to To Date LOC from the most recent previous program.
42	LOC/Hour Actual	Divide Actual Program Size (38) by Total Time (19) multiplied by 60. For example, 45 lines written in 90 minutes, productivity = $45 / 90 * 60 = 30$
43	LOC/Hour To Date	Divide To Date Program Size (39) by To Date Total Time (21) multiplied by 60.
44	Defects/KLOC Actual	Multiply the Total Actual Defects (25) by 1000 and divide by the Program Size (38). For example, with 17 defects to date and 153 Total New & Changed LOC, defects/KLOC To Date = $1000 * 17 / 153 = 111.1$.
45	Defects/KLOC To Date	Multiply the Total To Date Defects (21) by 1000 and divide by the To Date Program Size (39).
46	Yield Actual	Divide Defects Removed before compile (30) by Defects Injected before compile (24) and multiply by 100.
47	Yield To Date	Divide To Date Defects Removed before compile (32) by To Date Defects Injected before compile (21) and multiply by 100.
48	A/F ratio Actual	Divide Code Review Time in Phase (18) by sum of Compile and Test times (18).
49	A/F ratio To Date	Divide To Date Code Review Time in Phase (20) by sum of To Date Compile and Test times (20).