

Name: _____

ID: _____

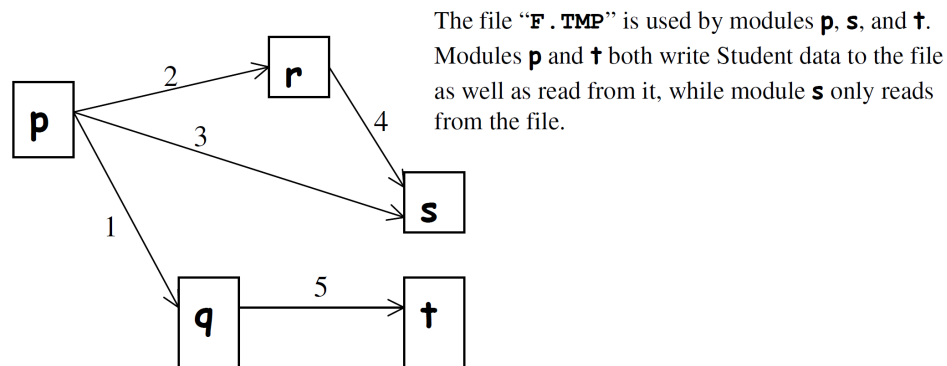
Time: 15 minutes

Problem 1

Given a set of functions that print or store student status reports, with data-flow connections as shown in the diagram and table below (arrow direction is In flow, and Out flow is counter-arrow), determine the coupling type(s) between the functions.

Table 1: Function call and return data

| Call # | In | Out |
|--------|----------------|----------------------|
| 1 | Student Object | StudentValid Flag |
| 2 | Switch Flag | - |
| 3 | Student ID | - |
| 4 | - | StudentReport Object |
| 5 | Student ID | Student Credit |



Determine the coupling types in the table ($CP1 \rightarrow CP10$):

Table 2: Coupling Types

| | p | q | r | s | t |
|----------|----------|----------|----------|----------|----------|
| p | | CP1 | CP2 | CP3 | CP4 |
| q | | | CP5 | CP6 | CP7 |
| r | | | | CP8 | CP9 |
| s | | | | | CP10 |
| t | | | | | |