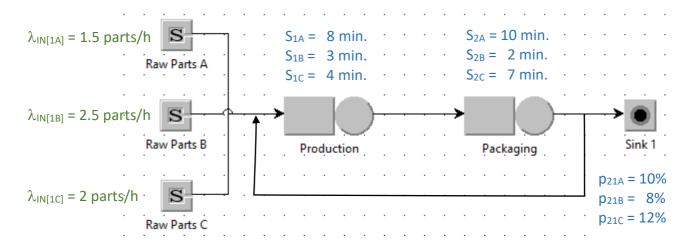
## Multi-class Open models' solution

Consider the following model of a production / packaging facility that produces three types of products (three classes), each one characterized by its own features in terms of arrivals of the raw parts, assembly and handling times. During the packaging stage, products are checked: the defective ones are sent back to the production stage, with an item class dependent probability.



Determine (using a programming language, and **NOT** a tool like a **JMT**):

- 1. The utilization of the two stations
- 2. The average number of jobs in the system for each type of product (class  $c N_c$ ).
- 3. The average system response time per product type (class  $c R_c$ )
- 4. The class-independent average number of jobs in the system (N)
- 5. The class-independent average system response time (R)