

## 1 EXERCISE

Try to create a full project for Santa Klaus.

### 1.1 RESSOURCES

Unfortunately, the elves of Santa Claus resigned. Santa Claus therefore hires the 7 dwarfs of Snow White.



You've to create resources with their costs and their work time :

Name	Remark	Cost	Worktime
Sneezy	Always sick...	14 €/h	80 %
Sleepy	Too tired	10 €/h	50 %
Happy	No problem !	14 €/h	100 %
Doc	Project Manager	20 €/h	100 %
Grumfy	Trade unionist	12€/h	80 %
Dopey	Simple tasks only	10€/h	100 %
Bashful	Good engineer	18€/h	100 %

Subcontractors are Microsoft, Nintendo and Sony (each has materials resources)

Microsoft	Nintendo	Sony
36000 € at the end	25450 € prorata	16795 € at the end

## 1.2 CALENDAR

mining industry collective agreement said :

5 days, from 7h00 to 12h00 and 14h00 to 17h00

## 1.3 TASKS

In fact, they're 3 categories of toys : wood toys (train, puzzle, ...), plastic toys (dolls, puppets, Lego...) and electronic games (PlayStation, X Box, Switch...)

### 1.3.1 Wood toys

Here are operations

- draw plan (need 3 weeks)
- wood cutting (need 2 weeks)
- wood assembly (need 4 weeks, high qualified resources)
- wood paint (4 weeks, preciseness task)
- varnishing wood (1 week, esay)
- packaging (3 weeks)

### 1.3.2 Plastic toys

Here are operations

- draw plan (need 9 weeks)
- plastic molding (need 2 weeks)
- plastic assembly (need 4 weeks, high qualified resources)
- packaging (3 weeks)

### 1.3.3 Electronic games

Here are operations

- choice of games (meeting 2 days, vote 1 day)
- games order to subcontractor (1 week)
  - Microsoft delay (6 weeks)
  - Nintendo delay (5 weeks)
  - Sony delay (8 weeks)
  - .. / ..

- Shipping for each : 2 weeks
- packaging (4 weeks)

## 1.4 HOLIDAYS

Swarfs could take their holidays but must inform their manager. Here is some holidays :

- ALL : November, 11th ; august, 15th ; July, 14th ;
- GRUMPY : syndicalist meeting each last Wednesday of month
- DOC : October, 1st (5 days)
- HAPPY : July, 9th (15 days, 3 weeks)
- SLEEPY and BASHFUL : August, 6th (10 days, 2 weeks)
- DOPEY : classroom each Monday, start of September

## 1.5 TIPS

You have to link each tasks and sub-tasks.

You must have a look at grouping (tasks, sub-tasks)

You may optimize some task (try to search for common tasks)

You should take some proactive actions (test ? Margins ?)

It's not possible to start to work before the "dwarfs day's ceremony" on the June 6th.

You've to create a retro-schedule, from December 24th

## 1.6 SEND TO :

mailto: [david.roumanet@ac-grenoble.fr](mailto:david.roumanet@ac-grenoble.fr)

before

Wednesday, 2nd up to 23h59

**Good luck**

