8/23/16

PROJECT MANAGEMENT NOTES

→ DIFFERENCE BETWEEN PLAYING & WORKING

→ COMMON TO ALL PROJECTS

→ LEAST AMOUNT BUT MOST EFFICIENT

WBS → WORK BREAKDOWN STRUCTURE
LIST OF EVERY DETAIL OF PROJECT

SHORT ⟷ ESTIMATE ⟷ LONG
RULE BY 6

→ EXPECTATIONS

GREEN = GOOD

YELLOW = OKAY

RED = NOT GOOD

→ PERT CHART

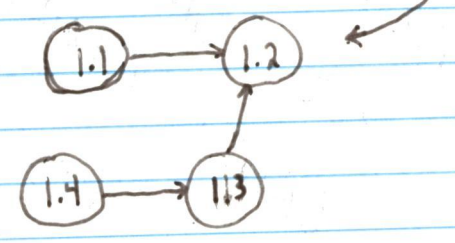
DEPENDENCIES

(1.1) IDENTIFY INTENSITY OF OVERALL

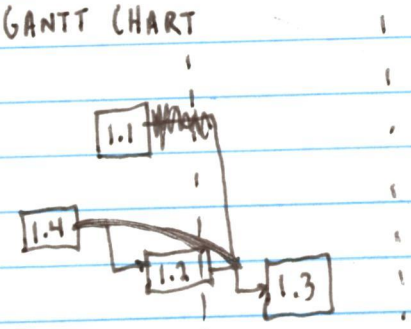
(1.2) IDENTIFY INTENSITY OF LED

(1.3) # OF LED

(1.4) DETERMINE SENSITIVITY OF LED



→ GANTT CHART



8/25/16

→ WORK BREAKDOWN STRUCTURE

→ PERT CHART

(1) SAC RULES

|

(2) UNDERSTAND MICROCONTROLLER → 3

(3) GET ROBOT TO MOVE ON FLAT SURFACE → 4

(4) BUILD FIRST 1/2 → 1

(5) TEST → 1

(6) ADJUST → 5

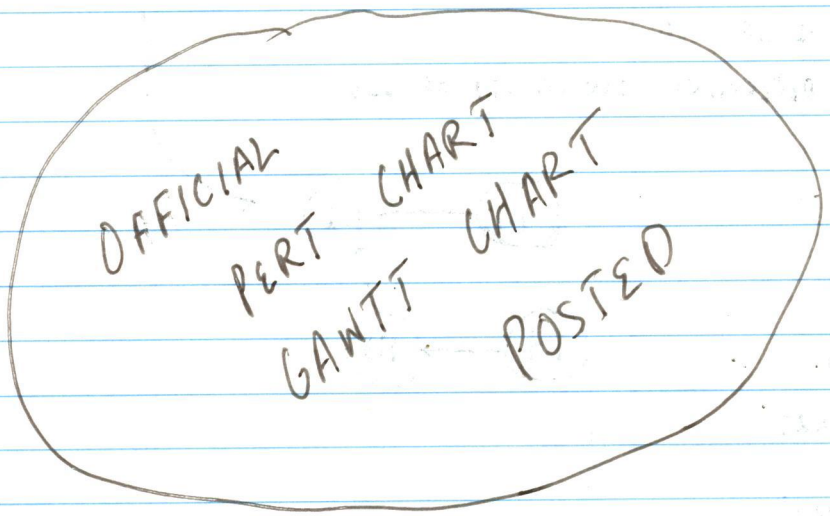
(7) BUILD SECOND 1/2 → 1

(8) TEST FULL → 1

(9) ADJUST → 5

(10) FINALIZE → 2

(11) CLOSE OUT → 2



8/30/16

(1) PROJECTS
- DESCRIPTION
- DELIVERABLES
- MILESTONES
  - FINAL REPORT
  - PROJECT MANAGEMENT
  - EXTENSIONS/CHANGES
  - LINKS/NOTEBOOK

(2) NOTEBOOK
- WEEKLY SUMMARY
- PAGE PER CLASS

(3) SLO's
- PAGE FOR EACH
- PROGRAM SLO
  - ADD STATEMENT
  - THIS COURSE

(4) VIDEO SITE
- PROPOSAL
- PROGRESS REPORT
- TEAM
- SALES PITCH
- FINAL REPORT
- CLOSEOUT

9/1/16

→ REAL TIME SYSTEM

EVENTS → INTERUPT → PRIORITY → HARDWARE

RECURSION → SOFTWARE

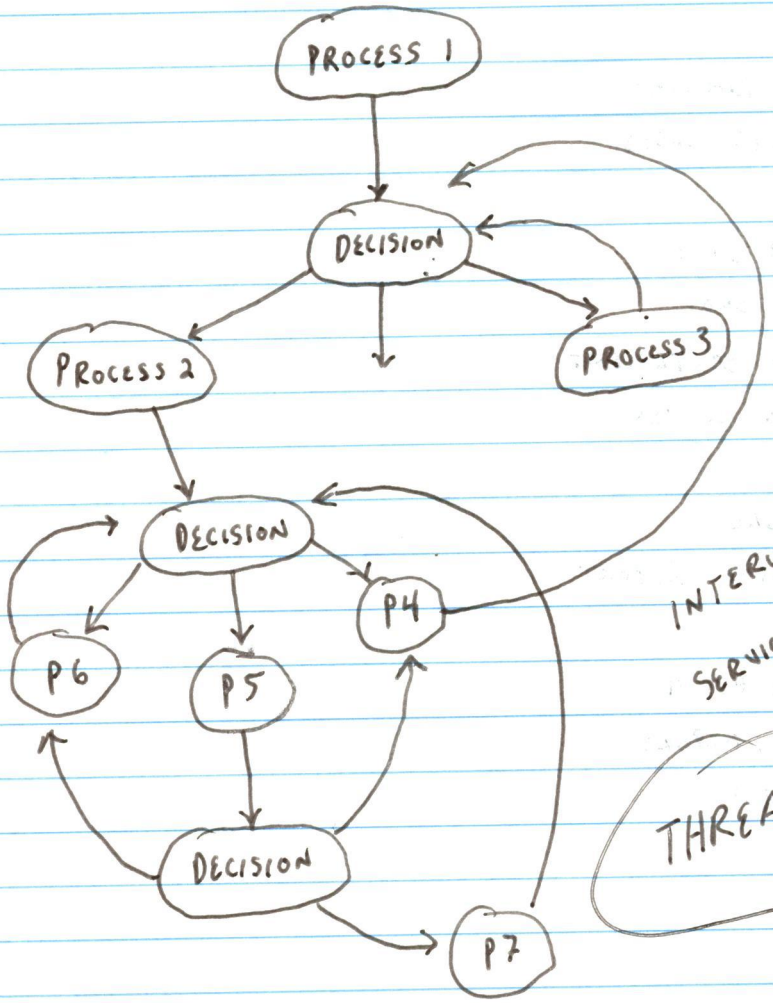
→ MASK

→ NON MASK → RECURSION

└→ PRIORITY STRUCTURE

COP

HIGH PRIORITY



INTERUPT - PROCESS SERVICE ROUTINE

THREADED

9/6/16

HARDWARE VS. SOFTWARE

RASPBERRY PI?

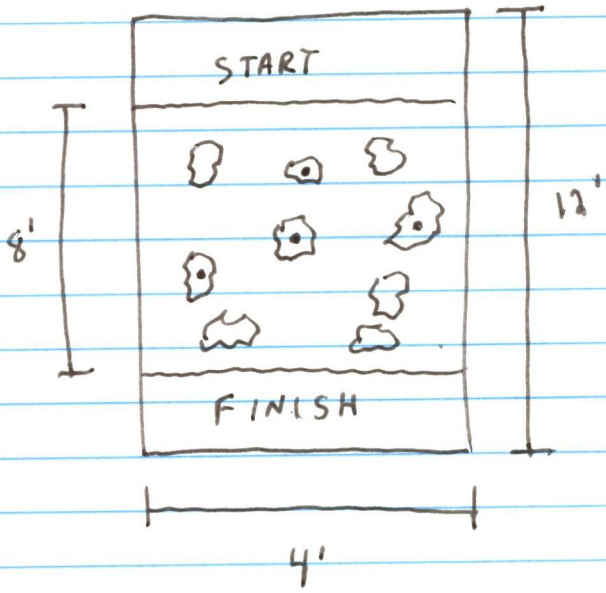
ARDUINO?

4 WHEEL ROBOT

4' & 8' PLYWOOD

1' PLEXIGLASS WALL

1" - 2" BOULDERS



9/8/2016

MILESTONES

- ASSEMBLE ROBOT → INTELLEGENCE, POWER, SENSORS, MOTOR DRIVER
- LOCAL NAVIGATION → HOW TO CLIMB BOULDER
- GLOBAL NAVIGATION → HOW TO NAVIGATE THE COURSE
- SYSTEM INTEGRATION, NAVIGATION, DEBUGGING
- ROBOT COMPLETES COURSE RELIABLY