

DEWBOT VI Mechanical Punchlist

~~16-February, 2010~~

~~17-February, 2010~~

~~18-February 2010~~

19-Feb-2010

1. Kicker
 - a. ~~Revise release mechanism to achieve reliable operation with either a full-competition service life (~300 kicks) or with rapid change parts capable of between-match replacement~~ ~~—additional development needed to address reliability the evening on 17-Feb. Completed. Kicker removed from proxy chassis for move to robot on 18-Feb~~
 - b. ~~Do we mount existing Kicker or build a new one?~~ Existing Kicker to be mounted. A replacement needs to be fabricated as a spare part.
 - c. We need to move the Kicker to DEWBOT on 17-Feb (that's ~~yester~~today) — in process
2. Chain Guards
 - a. ~~Cut PC (tonight)~~
 - b. Condition PC (thru today) — in process
 - c. ~~Cut counterframe (tonight)~~
 - d. Form guards (Wednesday or Thursday after Robotics)
 - e. Trim guards (Thursday or Friday)
 - f. Mount guards (Friday) [I'm thinking Velcro neatly applied]
3. ~~Side Guards~~
 - a. ~~Purchase Eyebolts (today)~~
 - b. ~~Drill holes & install Eyebolts (today)~~
 - c. ~~Install elastic (today)~~
 - d. ~~Test (today)~~
 - i. ~~Over the bump~~
 - ii. ~~Herding balls into the goal~~
4. Robot Top
 - a. ~~Rough cut top (can do tonight)~~
 - b. ~~Design top in detail (today)~~ — partially done
 - c. Finish cutting (Wednesday or Thursday)
 - d. Install top (Friday)
5. Install possessor
 - a. ~~Install properly (mechanical — today)~~
 - b. ~~Wire~~ — partially done
 - c. Test (while moving)
6. Fabricate & install passive Centeror
 - a. ~~Cut polycarbonate (today)~~
 - b. Condition polycarbonate — in process
 - c. ~~Build bending form~~
 - d. Form passive Centerors
 - e. Install
7. ~~Weight check (tonight) — including Kicker, polycarbonate top, ... (close to final wt) 118.0 lb~~
8. Permanently mount IR sensors

9. Design/Fab polymer mount for camera – in process
- ~~10. Strap for Battery~~
11. Chain tensioner for steering?
12. Generate graphics to be applied to DEWBOT top
13. Check Center-of-Mass
 - a. Add a little low mass if practical
14. Lube chains a little
15. Find correct electrical connector for Gaming Adapter
16. Install & wire kicker limit switch
17. Assemble inspection documentation (esp. BoM)
18. Simulate inspection
19. Change wheel treads (just before shipping)
20. Cut spare chain sets (okay after shipping) 2 sets each of:
 - a. 32 links (31 + master link) for Pivot
 - b. 40 links (39 + master link) for steering
 - c. 44 links (43 + master link) for drive
21. Fab other spare parts (okay after shipping)
22. Identify/assemble essential spare parts pack (okay after shipping)
23. Identify/assemble essential tool kit (okay after shipping)

Note for the last (4) items labeled “okay after shipping”: There isn’t a lot of time between shipping & Finger Lakes!

~~Completed 16-Feb~~
Added to list 17-Feb
Editions of 18-Feb
Editions of 19-Feb