DPRG RBNV Chat Record – 6/14/2022

Carl Ott
7:42 PM
18 June 2022- DPRG RoboRama 2022 https://www.dprg.org/roborama-2022/ Dallas Makerspace / Interactive Classroom (Club Pizza)
Carl Ott
7:45 PM
~7:42pm - Doug D - once again starting to work on his robots. Made enough progress to verify that they still work after weeks / months of idling. This is his telepresence robot. Gold Star for Doug D. WE also had an excellent demo of Dougs Dog very actively trying to protect him from any "robots gone wild"
Carl Ott
7:54 PM
~7:50pm - Discussion around embedding SW version numbers into code/ so you can tell what's loaded when you dust off old projects. Harold mentioned GitHub Actions - which together with runners, can automatically build version IDs into the code...
Carl Ott
7:55 PM
~7:54pm Ted found a small solar panel with a controller - took it apart to see what's going in...
Carl Ott
7:58 PM
Was puzzled by a circuit with a green indicator LED in parallel with 3 diodes in series... Was a trickle charger - he found that 2 amps didn't blow it out - and was wondering why most or half of the current didn't go through the LED.
Carl Ott
8:05 PM
~8:02pm - Michael gave an update on his robot. Trying to make some progress with a simple approach - no PID / no encoders...
Ray Casler
8:06 PM
What I was trying to say was the panel needs a reverse blocking diode otherwise the panel will discharge the battery.
Carl Ott
8:06 PM
Ahh - Ray - cool - thnx for the clarification.
Ted Meyers
8:10 PM
Thanks Ray. I just looked that up, and it does seem common that 3 diodes are used in series.
Ted Meyers
8:11 PM
So, if I want to run a bigger panel with more watts, I will need to use beefier diodes.
Carl Ott
8:16 PM
Ted - if you want to run higher voltage - you'll probably want a better way to drop the voltage. Have you considered using a purpose-built solar panel battery charger circuit? Seems like those are easy to come across at a reasonable cost...
Carl Ott
8:18 PM
Ted - here are a couple options... https://smile.amazon.com/Solar-Power-Management-Connection-Protection/dp/B07PBRK8KG https://smile.amazon.com/QINIZX-Controller-Lithium-Battery-Charging/dp/B09FG41KKZ
Ted Meyers
8:19 PM
Carl - Yeah, I decided to go with a 12V panel to match the battery. What I'm wanting is more amps. Trying to keep the project simple, but will probably escalate to a purpose-built charger by the time I'm done =)
You
8:21 PM
There's something to be said for purpose-built chargers - good odds that a purpose-built charger will be more efficient and waste less captured energy - and they'll probably handle corner cases better.

Carl Ott
8:28 PM
~8:27pm John K showed his 6-wheel robot.
john
8:29 PM
Tutosingenieria – YouTube channel with interesting video on using output shaft encoders on TTmotors
Carl Ott
8:34 PM
~8:31pm - Karim - has a question about standard R/C controls - and which receivers have multiple channel fail-safes. So if a signal is lost, what servo command does the receiver spit out, and can that be programmed.... Know it can easily be found for Cars, e.g. for R/C car throttles. Was wondering if R/C aviation units had better controls. Entire purpose was to have backup safety for large equipment.
Carl Ott
8:40 PM
Want the 2nd safety to be a completely separate source / classic R/C - a deadman switch.
This is the RC AUX switch I showed https://smile.amazon.com/Remote-Controlled-Electronic-Switch-Relay/dp/B08FLZXSD7 RC Remote Controlled AUX on/Off Electronic Switch Relay for Car Truck Boat LED
Carl Ott
8:50 PM
~8:49pm - Doug - previewed the RoboColumbus Mug for October / available for anybody who scores 1 point or more...
Carl Ott
8:57 PM
https://www.rcgroups.com/forums/showthread.php?1518317-What-is-receiver-output-when-no-signal t depends on the receiver, what they do with no signal varies, the receiver output could be; Random noise pulses The last known good pulse The pulse setup for failsafe mode No pulse. A pulsin comand on PICAXE reads the width of the pulse. To work out whats happening add a sertxd command to print the width of the pulse ..... sertxd("PulseWidth ",#pulsewidth,"uS",CR,LF)
Carl Ott
9:01 PM
~8:59pm - Michael and Harold showing shields that give screw down wire terminating blocks for different processors...