TOP LEVEL PUNCHLIST & COMMISSIONING (START, WORKING, COMPLETED)			
#	Due	Issue	Task Status
1	5/24/2012	READY - ER1 - Target Heating	**1. GRAMES** - Have Dave Meekins or designee from the Target Group review the heat transfer models. Incorporate changes as needed to better simulate thermal transfer and equilibrium. *=> Once model of new cooled target ready will put Dave in contact w/ Josh Feingold.* **2. GRAMES** - Use a better thermal conductor for the target frame and rod such as copper or aluminum instead of steel. *=> oxidized copper will be used w/ good conductivity and improved emissivity for radiative loss* **3. GRAMES** - Consider the use of a heat sink on the end of the target actuator rod. *=> flexible copper braid will short head load from frame to cooled flange, bypassing stainless steel rod* **4. GRAMES** - Consider the use of conductive paste for better heat transfer between the target and target ladder. *=> clamps will be used to press targets against ladder* **5. FORMAN** - Ensure the Run Plan is updated with max currents that are compatible with the target limitations. *=> Emailed request to operations liaison Eric Forman on 4/29.*
2	5/24/2012	READY - ER2 - Data Storage	**1. MICHAELS/SULEIMAN** - In addition to a local copy, follow the same technique as the experiments and ship the data to the computer center automatically. Verify availability during LSD. *=> Bob and Riad are working this issue w/ Anthony Cuffe and computer center*
3	5/24/2012	READY - ER3 - Magnet Map	**1. GRAMES** - Use Hall probes to look for possible perturbation sources. *=> Task has been added to commissiong plan, however the issue appars not to be with the spectrometer magnet itself, but the map* **2. GRAMES** - If possible, remap the S-bend magnet . *=> Yes, we'll have the magnet mapped after the experimentr.*
4	5/24/2012	READY - ER4 - Documentation	**1. HUTTON** - AD sign-off **2. FANNING** - DSO sign-off

5	5/24/2012	READY - ER5 - RSAD	**1. WELCH** - Correct sweep /controlled mode text *=> Request to KW on 4/29* **2. WELCH** - Clairify shield wall *=> Request to KW on 4/29*
6	5/24/2012	READY - ER6 - COO/ESAD	**1. GRAMES** - In the COO, GERT should not be a requirement. It should just be Rad worker I. *=> Corrected.* **2. GRAMES** - Table 2 in the ESAD lists the RSAD as a Machine Protection (First two rows). This should be remedied. *=> Corrected, text eliminated.* **3. GRAMES** - ESAD Table 2: RF faults and FSD faults are not mitigations for excessive beam energy or cavity gradient. The Excessive cavity gradient, and therefore the beam energy, is limited by the Cathode Power Supply taps. This should be verified as part of the commissioning. Remove references to RF vacuum and associated FSD faults. *=> Corrected table 2, added step to experiment commissioning.* **4. GRAMES** - Documentation refers to "Injector Segmentation" and "Hall" when referring to the Injector Vault (tunnel) area. This should be resolved to one name which can easily be understood. *=> COO/ESAD now use only "injector segment" or "injector/north linac" where appropriate.* **5. GRAMES** - The documentation should clearly state which are administrative controls and which are engineered controls.

7		ER7 - Safety Issues	**1. GRAMES** - It is clear that PEPPo has been conducting beam studies with the present machine safety configuration. However, a systematic interlock checks should be done and recorded. *=> Task has been added to commissioning plan.* **2. GRAMES** - There should be a Baseline Radiation survey of the PEPPo "hall" prior to the start of the experiment. (Radcon). *=> Task has been added to the commissioning plan.* **3. RADCON** - There should be radiation survey map of the PEPPo "hall" similar to the map of the other accelerator areas. *=> Request to KW on 4/29.* **4. GRAMES** - For Target moves in the "Z" direction, a list of qualified target movers should be provided to OPS personnel for information purposes. *=> Posted on 4/29 qualification checklist and existing qualified personnel to on-line documentation; may be viewed/printed by Operations*
8	4/30/2012	READY - Shift staffing	**VOUTIER** - Send e-mail for shift sign-ups
9	5/4/2012	READY - PEPPo run plan	**VOUTIER/GRAMES** - propose/lead run plan discussion
10	4/30/2012	READY - Mott run plan	**SULEIMAN/GRAMES** - One page plan of Mott measurements
11	5/2/2012	READY - Procedure to set/measure energy	**GRAMES** - Calcuation **GRAMES** - BS on 5/2
12	4/15/2012	READY - RR#9 - Develop procedures	**MAHONEY/LAHTI** - generate PEPPo FSD mask
13	5/18/2012	READY - how-to procedures	**TBD** - Beam setup procedures
14	5/18/2012	READY - how to alarms	**TBD** - Coordinate run/fixed list
15	4/1/2012	READY - Finalize EDM screens	**GRAMES -** work with BM to update control screens
16	5/24/2012	READY - Training	**AIKEN** - SAF132/SAF132A training
17	5/2/2012	BS - BTA	**HIGGINS** - ATLIS 12343 intall BTA software
18	5/11/2012	BS - EMI/Sorenson PS wrapper	**GRAMES/HIGGINS** - MPC5D02, MPD5D03,MPT5D04, MPA5D05
19	5/11/2012	BS - MCS/MPD5D03A current limits	**HIGGINS/WOOD** - ATLIS increase current limits
20	5/11/2012	DAQ - Test & integrate pick-up coils	**VOUTIER** setup DAQ/analysis configuration **VOUTIER** - document magnet pick-up system to wiki
21	3/15/2012	DAQ - VERY HIGH PRIORITY	**FANCHINI** - resolve discriminator re-triggering

22	3/31/2012	DAQ - HIGH PRIORITY	**AC/BM:** update script: start/stop/run_number/EPICS **JSR** check BPM result by 4/18 **RS** find out/update opsmdaq1=analysis
23	4/15/2012	DAQ - MODERATE PRIORITY	**BM** add on-line scaler via xscaler **RS** final plan to address pedestal semi-integrated **EF** decode EPICS & run information header **EF** verify ring buffer analysis works **EF/EV** test asymmetry calculation for modes 2,3
24	5/1/2012	DAQ - LOW PRIORITY	**TF/JSR** CODA on-line display **RS** readout T2 with ItoV
25	3/16/2012	MODELING	**YK** complete Elegant layout from 0L02 to target due 4/5 **PG** implemeting known magnet field maps **LA/EV** write analyzer power calculation code **OD** implement the exact conversion target geometry **OD** implement the exact crystal geometry **LA/OD** implement energy resolution of crystals **PA** release G4PEPPo.1 **PG/OD/MB** implement analyzing magnet field map **OD** implement target polarization from the local field **TBD** identify spin tracking **PG** release nominal G4PEPPo.finalJ **SR/OD** beam size effects **JSR/OD** beam position effects **EF/EV** electromagnetic background **LA** analyzing power calculation **LA** sensitivity to Pl, Pn, Pt components
26	3/30/2012	ANALYSIS - On-line	**TF/JSR** on-line monitoring histograms **EV** - Compton dose limits **JSR/EF** - Compton asymmetry analysis macro

27	5/18/2012	LSD - New cooled target ladder	**GRAMES** - targets/frame to Danny **MACHIE** - water cooled spool piece. **MACHIE** - braid with clamps at each end. **MACHIE** - new ladder out of copper that we will oxidize. **MACHIE** - target clamps. **MACHIE** - design to JF for thermal analysis
28	5/18/2012	LSD - Viewer ITV5D03 extension	**GRAMES** - install spacers (10, 13, 16, 19 mm)
29	5/18/2012	LSD - High current MPT5D04 solenoid	DM/PA produce identical spool 2.5" OD due 4/1 PA/JC pull out spare + supports, disassemble coil JG provide coil turns and current specification DM/GB spec number of coils needed DM spec coil design, leads, klixons, hardware JD wind coils starting mid-April EGG assemble coils, magnet, pipe to fixture 5/10 KB agreed to hi-pot coils, map magnet week 5/15 EGG agreed to install magnet 5/19 SA agreed to align magnet week of 5/22 DG hookup leads, klixons, LCW week of 5/22
30	5/24/2012	LSD - Measure stray fields	**GRAMES** - Test with halls probe.
31	5/24/2012	LSD - Remote fiber array control	**GRAMES** - support for cable strain relief
32	5/24/2012	LSD - Collimators	**SW** complete software controls **AF** test current monitoring **AF** document controls to wiki
33	5/24/2012	EXP- Interlock checks	**GRAMES** - Test and document ESAD Table 3 interlocks.
34	5/24/2012	EXP - Baseline radiation survey	**GRAMES** - Coordinate w/ radcon for map before experiment