

*If you are using a printed copy of this procedure, and not the on-screen version, then you **MUST** make sure the dates at the bottom of the printed copy and the on-screen version match. The on-screen version of the Collider-Accelerator Department Procedure is the Official Version. Hard copies of all signed, official, C-A Operating Procedures are kept on file in the C-A ESHQ Training Office, Bldg. 911A.*

C-A OPERATIONS PROCEDURES MANUAL

ATTACHMENT

4.56.aq RHIC Zone 7z1 Sweep Checklist

Text Pages 2 through 3

C-A OPM Procedures in which this Attachment is used.		
4.56		

Hand Processed Changes

<u>HPC No.</u>	<u>Date</u>	<u>Page Nos.</u>	<u>Initials</u>
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____
_____	_____	_____	_____

Approved: _____ *Signature on File* _____
 Collider-Accelerator Department Chairman Date

P. Ingrassia, W. MacKay

RHIC Zone 7z1 Sweep Checklist

Team Leader (TL) _____ Sweeper#2 (S2) _____

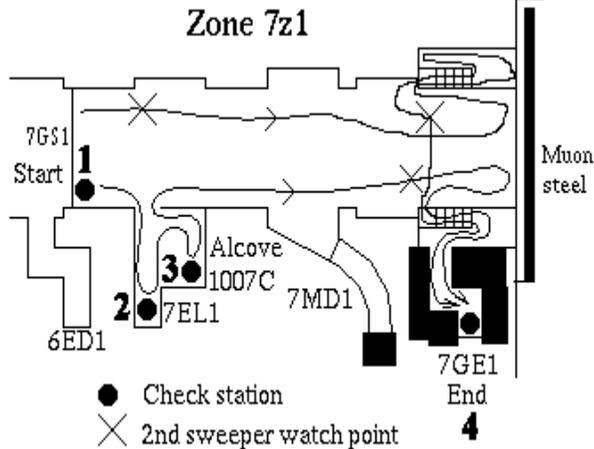
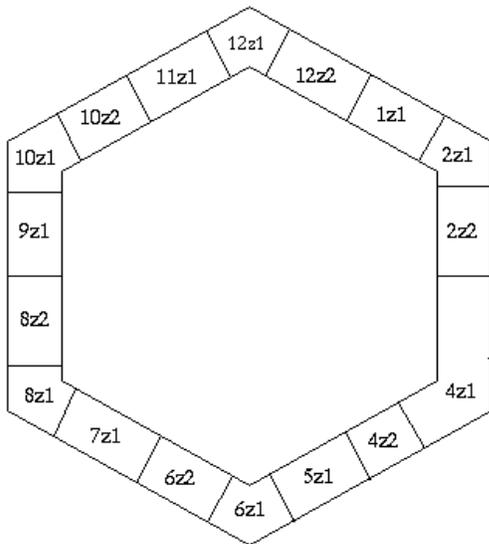
Time: _____ Date: _____

Warning:

IF any workers are encountered during the sweep, **THEN** contact the OC to see if the sweep should be aborted. Workers shall leave the enclosure **WITH** the sweep team. **IF** the workers crash out of the enclosure **AND** do not exit with the sweep team, **THEN** the sweep shall be re-started.

Prerequisites

- Two persons to perform the sweep,
- At least one sweeper not restricted from working at heights over five feet.
- RHIC Zone 7z1 Sweep Checklist (two pages)
- Required Tools: at least one flashlight,
- **Walkie-talkies (no phones at 7GE1)**
- Approved padlocks (2) for 7MD1 gate and Vapor Barrier Gate
- All Doors closed THEN 7z1 set to Controlled Access
- Keys: Sweep Reset key S/R015, Controlled Access key CA014, padlock key (RG184)



Note:

References to positions in the tunnel are made using the RHIC magnets. The identity of the local magnet can be determined by looking up at the “lower” cable tray and reading the magnet name on a blue (B) or yellow (Y) label. For example, the convention used is: I05Q17 (Inside, Q17) or O-05Q17 (Outside, Q17). References are for inside locations and are visible only by the TL

check

- ___1. Sweep team goes to gate 7GE1 TL requests simultaneous release from MCR.
- ___2. TL opens 7GE1 gate by turning the CA014 key clockwise, in the Controlled Access key-switch while Operator in MCR presses simultaneous release for 7GE1.
- ___3. Before start of sweep walk CCW to 7MD1 where TL verifies 7MD1 gate is padlocked and reset. IF the gate is not padlocked then sweep the area, padlock the door, and reset the gate.
- ___4. Sweep Team walks to 7GS1 doors. (TL inside and Sweeper 2 outside).

CONTINUED ON NEXT PAGE

- ___ 5. TL resets 7GS1 gate by turning S/R015 key in the RESET keyswitch at 7GS1-I
- ___ 6. TL observes RESET lamp light
- ___ 7. TL STARTS SWEEP by turning the S/R015 key CW in the SWEEP key-switch on 7CS1.
- ___ 8. TL observes AREA SECURED lamp blink once.
- ___ 9. Sweep team sweeps Clockwise (CW) around RHIC.
- ___ 10. TL stops to check the Exhaust Fan Vent Barrier at I-07Q17.
- ___ 11. Sweep team sweeps Clockwise (CW) around RHIC.
- ___ 12. S2 stands static watch at the electrical services alcove opposite I07Q13.
- ___ 13. TL enters the alcove and goes to the ladder at 7EL1.
- ___ 14. IF there is no mirror to verify no one is on the landing at the top of the ladder, THEN TL must climb the ladder to verify no one is on the landing and to check that 7EL1 is closed.
- ___ 15. TL resets gate 7EL1 using the S/R015 key in the Reset keyswitch at the bottom of the ladder.
- ___ 16. IF 7EL1 will not reset THEN TL climbs the ladder, closes 7EL1, then repeats step 14.
- ___ 17. TL observes RESET lamp lights after RESET.
- ___ 18. TL sets second check station (7CS2) by turning S/R015 key in the SWEEP keyswitch.
- ___ 19. TL observes AREA SECURED lamp blink once.
- ___ 20. TL searches goes to the far corner of the alcove to 7CS3.
- ___ 21. TL sets third check station (7CS3) by turning S/R015 key in the SWEEP keyswitch.
- ___ 22. TL observes AREA SECURED lamp blink once.
- ___ 23. TL checks inside EVERY rack and then sweeps out the alcove and joins S2.
- ___ 24. TL checks fan vent barrier on vent above S2 and observes overhead barricade is in place.
- ___ 25. Sweep team sweeps Clockwise (CW) around RHIC.
- ___ 26. Sweep Team stops to check the inner and outer Exhaust Fan Vent Barriers at I07Q9.
- ___ 27. Sweep team sweeps Clockwise (CW) around RHIC.
- ___ 28. Sweep Team stops to check the Electrical Alcoves and overhead barricades at I07D5
- ___ 29. Sweep team sweeps Clockwise (CW) around RHIC to I07Q3 before the Muon Steel.
- ___ 30. S2 checks exhaust fan vent grating at O-07Q3.
- ___ 31. S2 checks exhaust fan vent grating at O-07Q1.
- ___ 32. S2 goes down the stairs, walks to the Muon steel and searches the gap between the steel and the tunnel with a flashlight.
- ___ 33. TL goes down the stairs and stands static watch at the shield wall with a view to both directions up and downstream
- ___ 34. S2 climbs the ladder to the caged area at the end of the Dx magnet beyond the shield blocks and sweeps the area outside of the cage. IF the cage door is unlocked then they will go in, sweep the cage, exit, and padlock the door.
- ___ 35. S2 climbs down the ladder and sweeps up the stairs
- ___ 36. S2 goes to the shield blocks on the south side then turns around and sweeps back to join TL
- ___ 37. S2 sweeps to I07Q3 and joins TL
- ___ 38. S2 stands static watch (at I07Q3) where they can see the entry to the stairs on the opposite side of the tunnel.
- ___ 39. TL goes down the stairs, walks to the Muon steel and searches the gap between the steel and the tunnel with a flashlight.
- ___ 40. TL climbs the ladder to the caged area at the end of the Dx magnet beyond the shield blocks and sweeps the area outside the cage. IF the cage door is not locked then they will go in, sweep the cage, exit, and padlock the door.
- ___ 41. TL climbs down the ladder and sweeps back to the wood stairs.
- ___ 42. TL CALLS to S2 to join him/her.
- ___ 43. S2 goes to the shield blocks on the north side then turns around and sweeps back to join TL
- ___ 44. Sweep Team sweeps out labyrinth to 7GE1.
- ___ 45. TL ENDS SWEEP by turning the S/R015 key SWEEP key on 7CS4.
- ___ 46. TL observes the yellow AREA SECURED lamp is lighted
- ___ 47. TL radios MCR for simultaneous release for gate 7GE1.
- ___ 48. Sweep Team sweeps out 7z1 through 7GE1 door.
- ___ 49. TL contacts MCR and confirms that gates are reset and 7z1 zone indicates sweep is good.

Note:
IF the AREA SECURED lamp is not lit THEN contact MCR to verify sweep is good.

- ___ 50. After returning keys to the keytree, TL resets 7GE1 using the RHIC PanelView
- ___ 51. After returning to MCR and verifying that all information is filled out completely, TL files the checklist in FY_xx Sweep Log binder.