Thursday 7 December 1995

K. Reece

RICR.

Minutes of Meeting: Radiation Safety Committee

Date: Thursday 7 December 1995

Present: D. Beavis, E. Lessard, A. McGeary, S. Musolino, A. Pendzick, K. Reece, R. Thern, K. Woodle.

Subject(s): E893 and T915 in B1.

E893 and T915 are two full energy (~ 11.6 GeV/c/n Au) experiments that consist of short exposures; total experiment beam time for both should be ~ 6 hours. They will operate in the B1-line Upstream area and request to operate with the same NMC beam intensity limits of 5×10^5 Au ions per pulse with a beam size of ~ 100 cm^2. The B1 beamline and area have the following controls for E866 operation; fully enclosed beam pipe, dual NMC's and dual interlocks on each access gate. In addition, there is an interlocking chipmunk located beam right and next to the spiral staircase at beam height.

These two experiments require access to insert the items to be exposed. Sections of beam pipe both upstream and downstream of this location (table) were to be removed to permit this access. However, this would have limited the beam intensity since the beam would not be "fully enclosed". Therefore, the RSC approved operation of E893 and T915 given the following;

1. Sonatube or beam pipe must be installed before and after the "exposure table" such that the beam is fully enclosed except for this table, (CK-B1-E893/T915-1).

2. The "exposure table" should have orange wire mesh on the right side and top to limit access to the beam, (CK-B1-E893/T915-2).

3. Access controls remain as defined for E866 operation, (CK-B1-E893/T915-3).

4. Since the beam is not fully enclosed, Health Physics must remain at the gate when these experiments operate as an administrative control, (CK-B1-E893/T915-4).

5. EAG must be notified of any necessary changes to the upstream area sweep procedure, (CK-B1-E893/T915-5).

6. Health Physics must post all the B1 access gates (upstream and downstream) as "No Entry Permitted - Call Health Physics for access, x4660/4662, (CK-B1-E893/T915-6).

7. The area must be restored to original configuration for E866 operation when these experiments are complete, (CK-B1-E893/T915-7).

cc: RSC (w/o attachment)
RSC file (w/attachment)

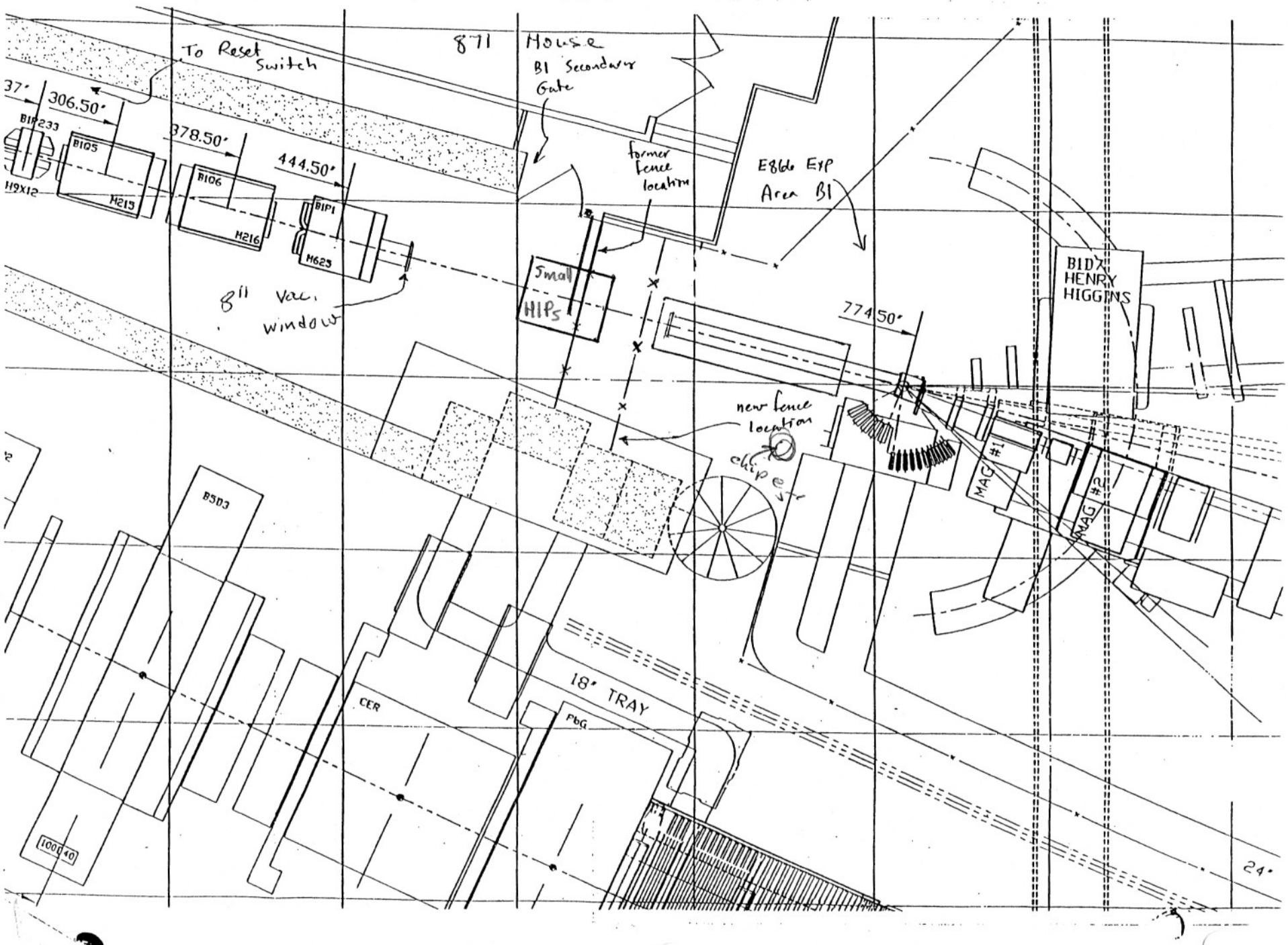
K. Woodle December 5, 1995

To:Ken Reece RSC
Subj:Radiation Safety for Expts. T915 and E893

Experiments T915 and E893 will run upstream of the B1 area on 11,12 Dec. using the 11 GeV/c Au beam. The experimenters will be inserting about 100 Nuclear Track Detectors into the beam (10 cm$\times$10 cm, $< 10^5$/spill) using a trolley which allows detectors to be switched from just outside the fenced area. (See Fig. 1) Some small number of detectors will require entry through the gate for insertion into the beam line.

The installation of the apparatus will require us to move the fence (a radiation safety barrier) which separates the B1 experimental area from the upstream area. A 10 ft length of the beam vacuum pipe (a radiation safety barrier) will be removed for installation of the experiments. Since there will be some space where a person could put a hand or a head into the beam, access to the area will be under the control of the liason physicist, who will train the users on the access procedure, and who will be present during all accesses.

With a beam rate of $< 10^5$/spill and a minimum beam size of 2 mm^2 the area is a class III area and the access controls (two NMC's) for the currently running E866 remain unchanged.


To Reset Switch
871 House
B1 Secondary Gate
former fence location
E866 EYP Area B1
37'
306.50'
378.50'
444.50'
774.50'
B1B233
B105
B106
B1P1
H9X12
H213
H216
H623
8" Vac. window
Small HIPs
new fence location
chipper
BID2 HENRY HIGGINS
MAG #1
MAG #2
B5D3
CER
PbG
18" TRAY
100040
24'