

NP/HS/CMC

22nd May, 1967.

M E M O R A N D U M

To: EEC
From: J. K. Bienlein, A. Citron, J. König, P. Schludecker,
H. Schopper and H. Ullrich
Re: Tests in the neutral beam

Referring to our Letter of Intention of 16 February, 1967, we propose to start test measurements in the neutral beam which has been set up during the recent shut-down by the end of June or beginning of July, 1967.

The aim of these test measurements would be:

- (1) to determine the total number of neutrons per pulse and to learn something about the contaminations of the beam
- (2) to study the collimation and the profile of the beam. For this purpose an adjustable collimator is being built at Karlsruhe
- (3) to investigate the neutron detection efficiencies of a sandwich scintillation counter and a thick plate optical spark chamber

No beam time is required, since these measurements could be performed on a parasite basis during the periods when target 1 is operating. Since according to the schedule target 1 will get beam only for about two weeks during the last three months of this year we would like to perform the tests during the summer. We plan to submit a proposal based on the test data later this autumn.