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**Decomposition of neutron signals into separate pulses and estimation of the proportion of scattered neutrons at PF-1000**[1] JIRI HITSCHFEL, P. KUBES, D. KLIR, K. REZAC, Czech Technical University in Prague, M. PADUCH, M. SCHOLZ, IPPLM, Warsaw, Poland — On the plasma focus facility PF-1000 at the deuterium filling the hard x-rays and neutrons from the DD fusion reaction were registered with scintillation detectors in axial and radial directions. The signals of neutrons from the plasma are generated in a few pulses and each pulse contains neutrons going directly, neutrons scattered from the components of chamber and objects out of chamber. This work deals with a separation of neutron signals into individual pulses, determining of the proportion of slowed and delayed neutrons and calculation the mean energy of neutrons and deuterons. The components of mean energy of neutrons were determined from the difference of signals registered downstream, side-on and upstream, with assumption of contemporary of hard x-ray and neutron production. The components of mean energy of deuterons were calculated from mean energy of neutrons.

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