

## Status of MuSIC facility

*Thursday 28 August 2014 11:00 (20 minutes)*

A muon beam facility called “MuSIC” has been built at Research Center of Nuclear Physics, Osaka University. MuSIC consists of the pion capture solenoid and the muon transport with a 36° curved solenoid. The intensity of MuSIC is expected to be  $2 \times 10^8 [\mu^+/\text{sec}/\mu\text{A}]$  from an experiment performed at MuSIC.

In 2014 a new beamline was built downstream of the curved solenoid. The new beamline has slits, quadrupole magnets, bending magnets and a spin rotator. This new beam line will be utilized for muon experiments including  $\mu\text{SR}$  experiments.

In this talk, I will talk about its detail design and prospects of MuSIC including the new beamline.

### **WG3: Accelerator Physics (Yes/No)**

Yes

### **WG2: Neutrino Scattering Physics (Yes/No)**

No

### **WG4: Muon Physics (Yes/No)**

Yes

### **WG1: Neutrino Oscillation Physics (Yes/No)**

No

### **Type of presentation**

Oral presentation

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**Session Classification:** WG4: Muon Physics and High Intensity applications