

# Massachusetts Institute of Technology

## Department of Physics

Course: 8.701 – Introduction to Nuclear and Particle Physics

Term: Fall 2020

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### Discussion Problems

from recitation on **October 29th, 2020**

#### **Problem 1: Higgs Bosons at Lepton Collider**

In the lecture we discussed the production of Higgs bosons at hadron colliders ( $pp \rightarrow H + X$ ). Lepton colliders are exciting tools to study the Higgs boson with precision. How are Higgs bosons produced at leptons colliders? Consider the energy of the electron and positron beam.

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