ILLINOIS INSTITUTE OF TECHNOLOGY

SPRING 2008
IRPO 315 - DESIGN OF LARGE SCALE STRUCTURE
AUTOMATED PARKING GARAGE

Project Plan and Objective
Develop a design for a large scale parking garage that can accommodate about 500 cars. The objective is to develop a design that goes beyond the standard parking systems used today. Rather, the attempt is to have a design which is more representative of “parking garages of future.” And as such, such features as quick handling of incoming and outgoing cars, efficiency in storage and aesthetics are considered in design.

- Completely self-sufficient building
- Incorporate the architecture of the various buildings on campus
- Automated system will include a vehicle elevator of lift system to move the vehicle so the driver does not have to

Class Composition
Multidisciplinary team of students majoring in architecture and aerospace, mechanical, and civil engineering from all academic levels.

Accomplishments
(i) Complete architectural & structural drawings.
(ii) Complete calculation report (structural and foundation design; mechanical system design, lighting/electrical design; cost estimation).
(iii) Poster presentation describing various drawings, design descriptions, details, conclusions, etc. and a PowerPoint presentation.