

Objective Energy Analyst

Education

- University of Pennsylvania, Philadelphia, USA** 2010-2011
 Master in Building Science GPA: 3.9/4
- Focus on high performance building simulation (Energy and CFD simulation)
- Tsinghua University, Beijing, China** 2006-2010
 Bachelor in Building Environment and Equipment Engineering GPA: 89/100
- Focus on HVAC design and retro-commissioning

Working Experience

- Graduate Mechanical Engineer** 2012.3-2012.10
Computational Simulation Group, Buro Happold Engineering Consulting Ltd.
- Built dynamic thermal models and performed energy simulation in IES-VE based on ASHRAE 90.1
 - Conducted CFD simulation in CFX for validation of mechanical design and indoor comfort
 - Provided recommendations on design for clients and MEP group based on simulation results
 - Organized presentations and reports
- Intern for HVAC retro-commissioning** Summer 2009
Beijing Fazhan Building (Office building)
- Conducted itemized energy analysis and diagnosis of HVAC system based on field measurement
 - Analyzed field data, proposed solutions and estimated energy saving potential
 - Organized reports and presented to clients

Academic Experience

- Energy modeling, calibration and sustainability design** University of Pennsylvania, Spring 2011
- Conducted energy modeling of campus buildings in DesignBuilder and compared energy simulation results with measured data and calibrated energy models
 - Proposed sustainable design strategies based on energy simulation results
- Dynamic integration between energy simulation and CFD simulation for outdoor conditions**
 Master degree thesis TC Chan Center, University of Pennsylvania, 2010-2011
- Coded in Matlab and achieved connection between EnergyPlus and Fluent
 - Tested simplified model to achieve high accuracy of energy simulation
- HVAC system design** Tsinghua University, Fall 2009
- Performed load calculation and heating/cooling equipment selection
 - Completed HVAC system design drawing in AutoCAD and conducted BAS design

Related courses

Building Performance Simulation, HVAC system commissioning, Performance Design Workshop, HVAC System Design, Building Automation System, Building Environment, Project Management

Skills

Simulation Software: IES-VE, DesignBuilder, EnergyPlus, Ansys CFX, FLUENT, Phoenics
 Other Software: AutoCAD, Rhino, Microsoft Office, Matlab
 Programming: C, Matlab, Simulink