Introduction
Industrial hygienists are often called to provide assistance in commissioning hospital facilities. This process validates ventilation systems necessary for infection control from common airborne infectious agents. This process has not been formalized yet commissioning is specified for life safety and other vital systems in hospitals. Infection control for airborne spread microbes involves ventilation parameters: filtration, air exchanges and pressure. In order to verify control of microbial contamination all of the ventilation parameters must be validated before microbial testing is initiated.

Objectives
Learning objectives to be understood after reading this poster:
• Parameters will be identified for special ventilation rooms to be validated before occupancy in order to assure ventilation for infection control.
• Microbial sample methods for infection control will be identified.
• Independent verification of air exchanges ensures test and balance accuracy.
• Comparison rank order microbial levels lowest in Protective Environment.

Interpretation
Air samples for fungi should demonstrate a rank order that demonstrates the lowest numbers from the comparison of spaces outside.
• This rank order applies to air and surface microbial counts
• Rank order for non cultured airborne particles (>0.5 µm) demonstrate lowest numbers in the best ventilation areas
• Air exchanges determined by carbon dioxide decay should be “close” to the test and balance room ventilation data
• The pressure differential should be greater than 2.5 Pascal’s ideal at 7.0 Pascal

Conclusion
• Validation of design specifications using instruments for determining air exchanges, pressure, and air filtration (especially in PE and Airborne Infection Isolation rooms).
• Comparison rank order microbial levels lowest in Protective Environment.
• Independent verification of air exchanges ensures test and balance accuracy.
• Baseline data parameters comprise Infection Control Commissioning Validation.