Across the United States, passengers travel more than 2.55 billion miles on elevators and escalators each year. An incredible eighteen billion elevator trips and 105 billion escalator rides are taken during that time, dwarfing both rail and air travel combined.

While these statistics are undoubtedly impressive on their own, what they say about elevator and escalator safety is perhaps even more remarkable. One of the safest forms of transportation in the world, the elevator and escalator industry works relentlessly to advance safety for riders and employees alike. Our industry boasts one of the lowest accident rates of any form of transportation, due in large part to the constant diligence in improving both the equipment itself and the safety codes and standards that govern the industry.

The safety code for elevators and escalators, also known as ASME A17.1/CSA B44, is updated every three years to ensure that the requirements represent the latest safety and technology available. Established by the American Society of Mechanical Engineers’ (ASME), the code sets standards, which govern elevators and escalators on safety across a full range of industry products and applications.

The code is developed by ASME’s A17 Standards Committee, a diverse group of subject matter experts who represent an international perspective including enforcing authorities, mechanical and electrical engineering and design experts, inspectors, consultants, labor authorities, building and facility owners, and installation and maintenance specialists.

What’s new this year?
With three years between updates, there are always many revisions and additions to the code. In the 2016 edition of the code, several major changes and updates went into effect including updates related to electric and hydraulic passenger elevators.

Some of these modifications were clarifications to existing actions, others include additional requirements for location of hoistway access switches, securing controllers located in public areas, and type of emergency stop buttons. Some of the most notable changes for the 2016 edition include:

- Updates to general requirements such as the addition of elastomeric buffers and their detailed requirements
- Several updates to seismic requirements, including the addition of a seismic detection device and a scan
Updated maintenance, repair and replacement criteria including requirements for replacement of car doors and speed governors, and testing of elastomeric buffer requirements

Updates to the alterations section including requirements for the addition of surface mount sump pumps, standard railings, and suspension means monitoring for elevators, as well as speed variation for escalators and moving walks

As elevator and escalator equipment ages and new technology advances are made, the codes that govern safety are also modified. The 2016 edition of ASME A17.1/CSA B44 offers multiple changes designed to increase safety, address new technology and clarify or enhance existing requirements. All jurisdictions should strongly consider updating to the latest standard, ASME A17.1-2016/CSA B44-16, along with the referenced standards, to ensure the greatest level of safety for the public and elevator personnel.

Have a comment or question for the experts? Want to submit a topic for a future issue of the newsletter? Send us your thoughts at theinsider@neii.org to keep the conversation going!