

ISWP Standards Working Group

April 14, 2015 Meeting Recap

The ISWP Standards Working Group met by conference call on Tuesday, April 14, 2015 from 12:00 p.m. to 1:00 p.m. U.S. Eastern Time. This provides a recap.

Action Items

1. Norman will share data from the rolling resistance test over different surfaces.
2. Matt and Norman would like to work on tests for rear wheels.
3. The group to come up with corrosion test for wheelchair as a system rather than making it component wise.

Discussion

1. The group discussed on whether rolling resistance and durability tests should be considered as system tests or components wise tests
 - a. Matt reported loosening and breaking of spokes and a test for recreating the scenario for breakage of spokes should be considered.
 - b. Mark suggested considering tests for composite wheels.
 - c. Concerns rose over testing to reflect real world situations, suggestions on specific testing to be done at manufacturing sites.
2. Discussion – Rolling resistance tests could be done at component level due to weight distribution issues, errors seen in roll-down tests, deceleration tests.
3. Discussion - Testing for bumpy versus soft surface recognition.
4. Discussion on upholstery – Lookup ASTM standards for upholstery and existing tests with manufacturers.
5. Abrasion testing – Norman uploaded articles on abrasion tests to the drive. They relate to abrasion on seats, biocomposite and psychotoxic tests.
6. Discussion on cushion testing – Exposure to environment is unique to LREs on seat cushion. ISO tests could be considered but we are considering such testing to be conducted by seating group.

7. Discussion on wheel locks –
 - a. Require frequent maintenance – tightening and adjustment

8. Discussion on Footrests –
 - a. Foot support turns and gets hit in real world conditions, not a worst case test with single impact which is the ISO test
 - b. Repeated impact tests would work on footrests

9. Comment - Increasing ratings beyond the ISO tests is appreciated, along with that maintenance of the wheelchair should be taken into account.

Participants

- ✓ Matt McCambridge: DEKA (formerly with Whirlwind)
- ✓ Norman Reese, LeTourneau University
- ✓ Karen Rispin, LeTourneau University
- ✓ Mark Sullivan, Convaid, Ride Designs and Polus Center (WG Chair)
- Don Schoendorfer, Free Wheelchair Mission
- Karl-Erik Westman, Handicap International
- Eric Wunderlich: LDS Church
- ✓ Chris Rushman, Motivation
- Dave Mahilo, Invacare
- Dr. Rory Cooper, University of Pittsburgh
- ✓ Anand Mhatre, University of Pittsburgh
- ✓ Dr. Jonathan Pearlman, University of Pittsburgh
- ✓ Nancy Augustine, University of Pittsburgh

Prepared by: Anand Mhatre, University of Pittsburgh