Benefits of new generation systems
- Increase capacity
- Improve service reliability
- Increase average train speed
- Reduce congestion
- Maximize the effective use of assets
- Reduce life-cycle costs
- Increase safety

Highly qualified staff involved in
- Research
- Development
- Testing
- Training
- Assessment of communications and train control technologies

Benefits of Testing at Transportation Technology Center, Inc. (TTCI)
- 48-mile test bed
- Speeds up to 165 mph
- No Federal Railroad Administration (FRA) waivers

TTCI can help your company
- Determine Positive Train Control (PTC) system requirements
- Develop complete, unambiguous specifications
- Select and configure systems to optimize benefits
- Coordinate and process radio frequency license applications for all new and renewed licenses issued in the U.S. railroad bands
- Host for railroad voice and data communications testing
- Spectrum needs assessment and radio frequency (RF) network design
- Evaluate radio effects on system performance
- Plan and conduct effective tests
- Migrate to PTC without disrupting operations
- Achieve interoperability
Secure test bed and lab includes

- Simulators
- Actual train control equipment (ACSES and IETMS)
- Railroad radio communication systems including
  - PTC 220
  - ATCS Spec 200
  - APCO P25
  - IEEE 802.11
  - CDMA Cellular
  - VHF Analog Voice
  - DGPS Beacon Coverage
  - RTK GPS Vehicle Tracking System
  - 120’ & 180’ Towers
- On-track testing of rail vehicle location determination equipment
- On-site installation of DGPS-based vehicle tracking system on locomotives and highway vehicles

The communications and train control test bed and lab supports

- Development and testing of systems under both IETMS and ACSES
- Safety/interoperability/compliance testing in a controlled railroad environment
- Benchmarking against the performance of existing equipment
- The only Rail Traffic Control (RTC) simulator with PTC integration