NIOSH Research and Planning

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CDC NIOSH

NIOSH Mining Program

Intramural Research and Planning Activities

- Internally Funded Projects
- Internal Reports
- Guidelines and Standards Committee Activities
- Related NIOSH Centers

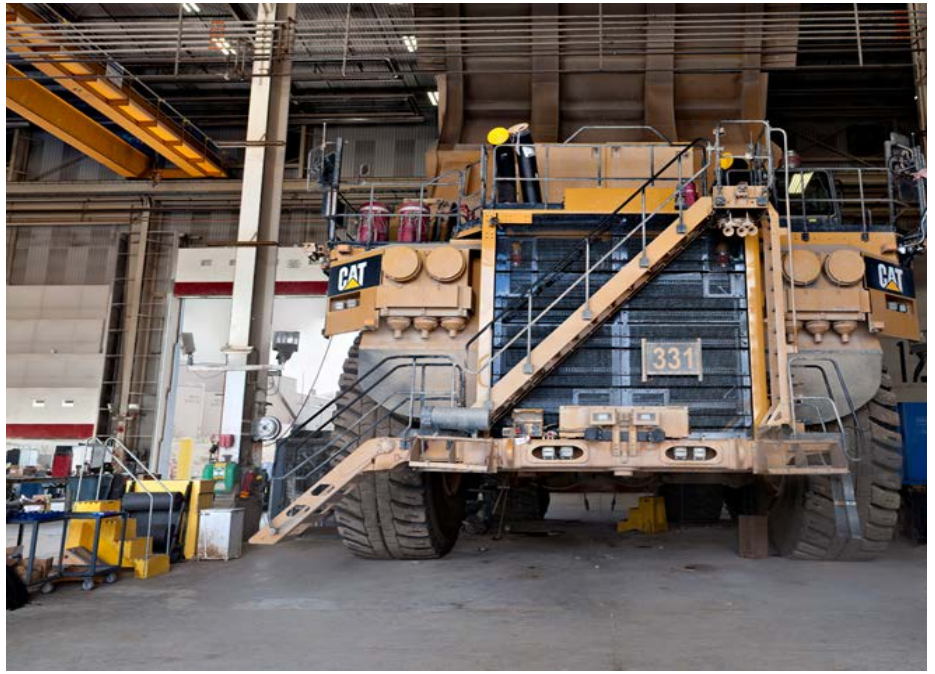
Intramural Research and Planning Activities

- Internally Funded Projects
  - Characterization of Haul Truck Health and Safety Issues
  - Validating Collision Warning and Avoidance System Detection Performance for Surface Mining Haul Trucks
  - Wireless Network Performance Requirements for Safety-Critical Systems in Mining

Intramural Research and Planning Activities

Internal Reports

- Mine of the Future: Disruptive Technologies that Impact our Future Mine Worker Health & Safety Research Focus (2/2018)
- Haul Truck Health and Safety Issues – Preliminary Considerations and Research Roadmap (4/2020)



Intramural Research and Planning Activities

Guidelines and Standards Committee Activities

- Global Mining Guidelines Group (GMG)
- Earth Moving Equipment Safety Round Table (EMESRT)
- ISO Standards Committee

Intramural Research and Planning Activities

NIOSH Center Activities Related to Automation and Emerging Technologies

- Center for Occupational Robotics Research (CORR)
- Center for Motor Vehicle Safety (CMVS)

Extramural Research and Planning Activities

- Mining Advisory Committee
- Program Review Recommendations
- Request for Information
- Research Contracts and Agreements

Extramural Research and Planning Activities

- Mining Safety and Health Research Advisory Committee (MSHRAC) – Metal Mining Automation and Advanced Technology workgroup
  - Industry workshop: “Emerging Technologies in Metals Mining: Health and Safety Implications”, Denver, 2018
  - Recommendations report, 2019
- NIOSH Mining Program External Review
- Federal Register – RFI

Extramural Research and Planning Activities

2020 NIOSH Mining Program Broad Agency Announcement and Agreements

- Automation Experience with Global Perspective, University of Pittsburgh with University of Queensland
- Intrinsically-Safe Mine Rescue UAV Design, Xtraction Science and Technology, Inc.
- Autonomous Docking of Face Haulage Mining Machinery in GPS-Denied Environments, University of Kentucky
- Advance Sensors and Robotic Deployment Platform for Increased Safety and Rapid Response, IAA with NASA JPL/Caltech

Thanks for your attention

NIOSH Mining Program
www.cdc.gov/niosh/mining