

Agriculture and Agricultural Engineering

Packer Engineering provides experienced agricultural engineers and scientists who cover the full spectrum of agriculture and related support industries in America and the world. Clients benefit from over 47 years of experience in all aspects of mechanical, electrical, chemical, environmental and agricultural sciences. Packer has distinguished itself by providing timely solutions to the most difficult problems anywhere in the world, 24 hours-a-day, 7 days-a-week.



Our involvement in the Agricultural Industry includes:

- Animal herd loss assessment including dairy herd health (including stray voltage), breeding, and nutrition
- Crop loss evaluation that includes related meteorological, irrigation, and chemical issues
- Food processing issues such as plant operation irregularities, equipment repair and maintenance histories, and plant and regulatory procedure evaluations
- Cotton gin and crop loss assessments that cover gin machinery, process and procedures
- Farm infrastructure evaluations from milking parlors, electrical systems, storage and animal facilities to environmental issues, farm equipment, and personal injury
- Farm machinery damage and related injuries
- OSHA and FDA regulation evaluations

Services:

- Accident investigation and reconstruction
- Design analysis and performance evaluation
- Bench and field testing
- Mechanical testing and analytical analysis
- Full litigation support services
- Product liability analysis
- Laser scanning accident scene documentation



Packer Engineering developed the "Stalk Stoker™" which gasifies plant material left after harvesting. By running this gas through a microturbine, we can generate electricity and heat.

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Packer Engineering's multi-disciplinary expertise includes a broad range of engineering and agricultural disciplines such as dairy science, cotton ginning, crop science, chemical, biomechanical engineering, human factors and ergonomics, mechanical engineering, materials, environmental, facilities, civil/structural, electrical/electronics, fire modeling, product integrity and structural engineering.

Types of Projects

Highway equipment collisions and accidents

- Accident reconstruction
- Component evaluation and testing
- Restraint system analysis including rollover protection structures (ROPS) for farm, mining, and recreational equipment
- Accident scene and equipment damage documentation
- Equipment fire origin and cause determination
- Crash testing

Off-highway equipment collisions and accidents

- Skid-steer loader investigations
- 4-wheeler and dirt bike investigations
- Tractor, combine, implement, and construction equipment investigations
- Component evaluation and testing
- Operator injury mechanisms and training determination

Agricultural product processing facilities

- Clean-in-place unit investigations
- Chemical burn and other personal injury investigations
- FDA and OSHA policy and procedures investigations
- Cotton ginning facility and operation investigations and consulting

Crop evaluations

- Anhydrous ammonia application and application equipment investigations
- Crop damage claim investigations
- Irrigation investigations
- Farm facility issues
- Total confinement, feed storage and drying equipment investigations
- Farm waste management system investigations
- Structural collapse investigations

Certification testing

Design evaluation

