# Department/School Profile

## Department/School: Manufacturing and Industrial Engineering

### Vision:
The department aspires to be the cutting edge of talent and technology.

### Mission:
The Manufacturing and Industrial Engineering Department provides high quality education, coupled with contemporary research programs, to prepare undergraduate and graduate students for the practice of manufacturing and industrial engineering for the growing economic and technological needs of the society. The department provides opportunities for all students to participate in industrial internships and research to enhance their understanding of global, societal and technical challenges associated with manufacturing and the importance of lifelong learning. The department emphasizes written and verbal communication and offers a strong hands-on laboratory component throughout the curricula.

## PROFILE

### Majors:
- Manufacturing Engineering
- Engineering Technology
- Engineering Management

### Graduate Programs:
- MS Manufacturing Engineering
- MS Engineering Management

### Students:
- **Number of Students:** 180
- **Characteristics:** 100 BS MANE, 40 BS ET, 15 MS MANE, MS 25 ENGM

### Faculty:
- **Number of Faculty:** 13
- **Ranks:** Professors 6, Associate Prof. 2, Assistant Prof. 2, Lecturers 3

### Campus Program Offering

The department offers BS Engineering Technology only in Brownsville.
The department offers BS Manufacturing Engineering only in Edinburg.
The department offers MS Manufacturing Engineering only in Edinburg.
The department offers MS Engineering Management only in Edinburg.
54% of program/courses are available at both campuses (face-to-face, online, hybrid, or ITV)
27% of program/courses in the first 2 years of study per major map are available at both campuses (face-to-face, online, hybrid, ITV)
27% of program/courses in the upper division are available at both campuses (face-to-face, online, hybrid, ITV)
0% of graduate program/courses are available at both campuses (face-to-face, online, hybrid, ITV)

*Note: The programs are lab intensive, so they cannot be duplicated at the other campus without prohibitive cost.*

### Stats & Highlights:
- 4-year retained or graduated BS MANE – 83%
- Percent of female graduates - 28/85 – 33%

The department has plans to obtain accreditation for the BS in Engineering Technology program.
The department is working towards offering a fully online accelerated MS program in Engineering Management.

Revised: January 29, 2020
**Success Stories/“Bragging”:**
The department faculty members Dr. Li, Dr. Srivastava, Dr. Butler and Dr. Dr. Timmer have received a $3.9 million consortium grant from the Department of Defence to cultivate an educational ecosystem to draw young talent to additive manufacturing, smart manufacturing, and innovations in lightweight materials, structures and systems.

Dr. Akundi has received a $100,000 grant from NSF “Model-based Systems Engineering Boot Camp: An Initiative to Integrate Current Systems Engineering Transformations into Workforce Development”.

**Traditions:**
Student Society of Manufacturing Engineers.

**Mantra/Slogan:**
Successful Together