

## **Wake Technical Community College Major CIP Program**

### **Technology Acquisition and Infrastructure (2017 - 2023)**

Project Budget - \$40.3M

This ongoing program includes various campus wide improvement projects to increase the capacity to teach online courses, including the following equipment and systems; new server hub at the RTP Campus, addition of redundant alternate fiber connectivity, loop all campuses together, additional wireless access points, additional servers and storage equipment, smart classroom upgrades and infrastructure software upgrades.

### **Campus Wide Repair & Replacement (R&R) Projects (2017 - 2023)**

Project Budget - \$28.5M

This continual program contains various campus wide repair & replacement projects including the following equipment and systems; HVAC Equipment, HVAC Controls Upgrades, Elevator Repairs, Building Envelope Upgrades, Electrical Systems, Life Safety Equipment (Fire Alarms & Sprinkler Systems), Library Building Restroom Upgrades, Minor Capital Equipment Replacements and Building Alterations to meet changing academic needs.

### **Campus Wide Infrastructure Upgrades (2017 - 2023)**

Project Budget - \$33.3M

This recurring program includes various campus wide infrastructure upgrade projects including the following; Security Camera Upgrades and Additions, Addition of Building Access Card Readers, Installation of Cellular Signal Repeaters, Mass Notification System, Exterior Wayfinding Signage Upgrades, Pedestrian and Vehicular Accessibility Upgrades on the Main and Perry Health Sciences Campuses, Main Campus Northern and Southern Loop Road Extensions, Main Campus Parking Lot & Roadways Repaving, Extension of the Chilled & Hot Water Distribution Piping at Northern Wake Campus and Main & RTP Campuses Land Acquisition.

### **NCCCS #2282 - Classroom Building 2 @ RTP Campus (2017 - 2021)**

Project Budget - \$46.9M

This project constructs a 63,614 GSF building classroom building and includes the construction of a 315-space temporary parking lot and a 200-space permanent parking lot. This building will be supplied with chilled water and heating water from the existing energy plant in RT1, but will allow for new boilers, chillers, pumps, etc. to be added to the existing energy plant for the additional capacity. The energy plant in RT1 will provide enough cooling and heating capacity for RT1, RT2 and RT3.

### **NCCCS #2283 - Automotive & Collision Repair @ Northern Wake Campus (2017 - 2021)**

Project Budget - \$41.8M

Project consist of 100,000 GSF buildings comprising of 75,000 GSF of automotive/collision repair lab space and 25,000 GSF of classroom space. Programs include, but not limited to; Automotive Systems Technology including diagnostics and repair of electrical/electronic systems, emissions, brakes, engine performance, steering, suspension, transmission, climate control, diesel fuel systems, alternative fuel systems, collision repair and general education classes.

### **NCCCS #2299 - Facilities Management and Warehouse Building @ Southern Wake Campus (2017 - 2021)**

Project Budget - \$19.0M

Project includes 35,000 GSF of facilities management shop/office space and 12,000 GSF of warehouse/office space. Programs include: Facilities maintenance and management, including carpentry shop, metal shop, HVAC repair, plumbing repair, electrical repair, paint booth, key shop, landscaping equipment repair, outdoor/indoor storage, warehouse, inventory control and office space. In addition, the Facilities programs dealing with Design & Construction, Energy/Sustainability and Transportation will be housed in this facility.

**NCCCS #2178 - Building R Construction @ Southern Wake Campus (2018 - 2020)**

Project Budget - \$12.5M

This project provides a 34,000 GSF laboratory building containing new labs to replace existing older labs in various buildings and provides for skilled training in a modern teaching environment to match the technology and instructional needs of today and into the future.

**NCCCS #2298 - Perry Health Science Campus Miscellaneous Renovations and Upgrades (2020 - 2021)**

Project Budget - \$525K

This project will provide design and construction services for renovations to two buildings on the Perry Health Sciences Campus. In the Health Sciences Building B, rooms will be modified to construct a new control and a simulated apartment setting to support EMS training. In the Health Sciences Building 2, existing spaces will be renovated to accommodate sonography and EDT labs.

**NCCS #2470 - Southern Wake Campus Ready Hall and Power Mechanics Renovations (2020 - 2021)**

Project Budget - \$6.8M

This project consists of improvements to the 10,460 sf Power Mechanics classroom & laboratory facility and the welding labs in Ready Hall. Phase I will renovate the interior and exterior of the old plumbing and gas in Ready Hall to convert them into new Stick and MIG/Gas welding labs. Scopes of work includes new lighting, electrical, plumbing, mechanical and structural upgrades needed to create a functionally safe and environmentally sound program. Phase II includes a feasibility study to assess and prioritize the programs and projects within the Power Mechanics and Ready Hall buildings. Program prioritization includes Residential Electric, Refrigeration, building upgrades, and select demolition.

**New Eastern Wake Site Land Acquisition (2020)**

Project Budget - \$10.9M

This project will purchase nearly 106 acres of greenfield in eastern Wake County along I-87 near the Rolesville Road and Wendell Boulevard interchange. The intent of the acquisition will be to establish a Wake Technical Community College presence in the eastern portion of Wake County. Initial programs will include Public Safety, General Education, and Industry 4.0 technologies.

**NCCCS #2300 - New Eastern Wake Site Master Plan (2020)**

Project Budget - \$365K

This project will fund the initial master planning efforts to support the establishment of Wake Technical Community College's eastern Wake County presence.

**NCCCS #2305 - New Eastern Wake Site Central Energy Plant & Infrastructure (2020 - 2023)**

Project Budget - \$64.0M

This project will provide a 20,000 square foot energy plant to house chillers and boilers providing distributed hot and cold water for heating and cooling purposes throughout the campus. Intense energy savings and sustainability will be incorporated through the means of efficient systems derived from advanced solar and geothermal technologies. A preliminary investigation will be conducted to determine whether a central plant or distributed regional plants concept will provide the most efficient service to the campus. In addition, this project provides for the initial site clearing, excavation and grading; the installation of roads, bridges and access points; and the construction of appropriate site drainage and retention ponds, etc. to support the first phases of the site development.

**NCCCS #2303 - Eastern Wake Site Public Safety Simulation Complex (2021 - 2023)**

Project Budget - \$49.0M

This project will construct a reality-based simulation center for training programs based in law enforcement, emergency medical service, and fire rescue. The facility will include a training track to support emergency driver training, CDL training and motorcycle training. The simulation complex building is anticipated to be 70,000 square feet and will provide a 4D Immersive Interior Training Village, including a two-story downtown street replica, along

with multi-function and specialty training rooms supporting law enforcement and fire/emergency rescue reality-based training. Unmanned aerial systems and flight training tied into future Industry 4.0 mechatronics programs supporting high tech student training will also be incorporated into the facility. The project also includes associated extension of chilled water and heating water piping systems and the extension of roadways and parking.

**NCCCS #2302 - Eastern Wake Site General Education Building #1 and Student Services (2022 - 2024)**

Project Budget - \$69.7M

This project is comprised of an 110,000 GSF classroom and student services building, including general chemistry and biology labs, biopharma labs, student services spaces, library and individualize learning areas. The project also includes associated extension of chilled water and heating water piping systems and the extension of roadways and parking.

**NCCCS #2535 - Eastern Wake Site Technology 4.0 Building (2023 - 2024)**

Project Budget/Construction Cost - \$55.3M

A new classroom building estimated at 70,000 GSF with Advanced Manufacturing, Critical Operations, 3D Printing, Mechatronics, Machining, Architectural/Mechanical/Civil Engineering Technologies, Geomatics, and Electronics Engineering Technology.

**NCCCS #2304 - Eastern Wake Site General Education Building 2 (2023 - 2025)**

Project Budget - \$57.6M

This project constructs a new 80,000 GSF general education building and includes the extension of chilled water and heating water piping system and the extension of roadways and parking.

**NCCCS #XXXX – Eastern Wake Site General Education Building 3 (2024 - 2025):**

Project Budget - \$57.7M

This project constructs a new 80,000 GSF general education building and includes the extension of chilled water and heating water piping system and the extension of roadways and parking.

**NCCS #2301 - Perry Health Sciences Campus Building 3 & Health Education Building Renovations (2026 - 2028)**

Project Budget - \$86.8M

A new classroom building estimated at 70,000 GSF that includes the extension of utility infrastructure and roadways. Programs include, but not limited to; nursing, medical laboratory/pharmacy/human services/surgical technologies, medical assisting, radiography, emergency medical science, and phlebotomy.

**NCCCS #XXXX – RTP Campus Classroom Building 3 and Parking Deck (2026 – 2028)**

Program Budget - \$98.4M

A new classroom building estimated at 80,000 GSF that includes a new 1,200 space parking deck and extension of utility infrastructure/roadways.