2021-2023 T-STEM Planning and Implementation Grant
Competitive Grant Application: Due 11:59 p.m. CT, November 10, 2020

TEA — Texas Education Agency

NOGA ID		Application stamp-in date and time

TEA will only accept application documents by email, including competitive grant applications and amendments. Submit grant applications and amendments as follows:

Competitive grant applications and amendments to competitivegrants@tea.texas.gov

Authorizing legislation: G.A.A., Article III, Rider 49, 86th Texas Legislature; TEC §§39.235

Grant period: From 02/15/2021 to 06/15/2023   **Pre-award costs:** ARE NOT permitted for this grant

Required attachments: Refer to the program guidelines for a description of the required attachments.

Amendment Number

Amendment number (For amendments only; enter N/A when completing this form to apply for grant funds): **NA**

1. Applicant Information

Name of organization: **Fort Worth ISD**

Campus name: **Young Men's Leadership Aca**   CDN **220905**   Vendor ID **1-756001613**   ESC **11**   DUNS **073177776**

Address: **100 N University Drive, Ste. SW204**   City **Fort Worth**   ZIP **76107**   Phone **817.814.2281**

Primary Contact: **Mirgitt Crespo**   Email **mirgitt.crespo@fwisd.org**   Phone **817.814.2281**

Secondary Contact: **Stephanie Pollard**   Email **stephanie.pollard@fwisd.org**   Phone **817.814.2281**

2. Certification and Incorporation

I understand that this application constitutes an offer and, if accepted by TEA or renegotiated to acceptance, will form a binding agreement. I hereby certify that the information contained in this application is, to the best of my knowledge, correct and that the organization named above has authorized me as its representative to obligate this organization in a legally binding contractual agreement. I certify that any ensuing program and activity will be conducted in accordance and compliance with all applicable federal and state laws and regulations.

I further certify my acceptance of the requirements conveyed in the following portions of the grant application, as applicable, and that these documents are incorporated by reference as part of the grant application and Notice of Grant Award (NOGA):

- ☒ Grant application, guidelines, and instructions
- ☒ General Provisions and Assurances
- ☒ Application-Specific Provisions and Assurances
- ☒ Debarment and Suspension Certification
- ☒ Lobbying Certification
- ☒ ESSA Provisions and Assurances requirements

Authorized Official Name **Michael Ball**   Title **CFO**   Email **mirgitt.crespo@fwisd.org**

Phone **817.814.2281**   Signature *Michael Ball*   Date **10-7-2020**

Grant Writer Name **Stephanie Pollard**   Signature *Stephanie Pollard*   Date **10-5-20**

◉ Grant writer is an employee of the applicant organization.   ○ Grant writer is not an employee of the applicant organization.

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

3. Shared Services Arrangements

Shared services arrangements (SSAs) **are not** permitted for this grant.

4. Identify/Address Needs

List up to three quantifiable needs, as identified in your needs assessment, that these program funds will address. Describe your plan for addressing each need.

Quantifiable Need	Plan for Addressing Need
According to the Bureau of Labor Statistics, employment in STEM occupations are forecast to grow at a rate of over 76% higher than non-STEM jobs. YMLA students interested in STEM careers do not have a pathway into this field.	Develop a T-STEM program that provides YMLA students with rigorous coursework, opportunities for work-based experience, marketable credentialing, and seamless transition into a competitive job market.
In the 2016-2017 academic year, 0.0% of YMLA students earned dual credit in science related coursework (2017-2018 − TAPR).	Providing opportunities for dual credit in science is essential for well-rounded students in an early college environment. Campus will increase dual credit completion in science by introducing a T-STEM pathway.
According to the FWISD 2018-2019 Senior Exit Survey, 41% of YMLA students indicated a need for addition support in " job seeking skills" and 21% in "researching career options".	Offer work-based learning experiences at every grade level, internships and job shadowing opportunities with partners. Ensure comprehensive wraparound services are offered through targeted interactions with teachers, college advisors, high school counselors, and peer support.

5. SMART Goal

Describe the summative SMART goal you have identified for this program (a goal that is Specific, Measurable, Achievable, Relevant, and Timely), either related to student outcome or consistent with the purpose of the grant.

In academic year 2021-2022, Young Men's Leadership Academy (YMLA) will be in the planning year for T-STEM. In academic year 2022-2023, YMLA will enroll 100 students per grades level in the 6th-9th grade into a newly developed T-STEM: Mechatronics, Robotics, Automation Engineering, and Business academy that is aligned with industry needs, provides real-world work experiences at every grade level, marketable credentialing, and seamless transition into a competitive job market.

6. Measurable Progress

Identify the benchmarks that you will use at the end of the first three grant quarters to measure progress toward meeting the process and implementation goals defined for the grant.

First-Quarter Benchmark

*Develop, execute, and secure any remaining MOUs, articulation agreements, data sharing agreements, and District School Board approvals to ensure program participation *Draft evaluation instruments, and reporting schedule *Complete a needs assessment to determine final purchasing needs and acquisition schedule *Engage advisory council members as necessary (monthly) *Begin the RFP and/or bid process to procure necessary equipment, and program materials in compliance with EDGAR regulations *Select, hire and onboard remaining contract staff (curriculum specialists/writers)*Continue to draft curricula, and project-based activities/assignments in collaboration with industry partners *Plan, provide, and assess College Industry events* Provide and assess PD

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

6. Measurable Progress (Cont.)

Second-Quarter Benchmark

*(Re)assess campus needs, outstanding purchase orders and RFP
*Continue to offer targeted PD for T-STEM teachers and staff
*Continue Leadership Team and Advisory Council meetings as scheduled
*Begin coursework and campus-based observations (Cohort 1)
*Collect baseline program data and demographics
*Update recruitment materials, calendar, and processes
*Begin recruitment/lottery process for Cohort 2 students
*Host/Attend recruitment events including District-wide EXPO, campus visits, and Information Nights

Third-Quarter Benchmark

*Continue to offer targeted PD for PTECH teachers and staff *Begin budget closeout, 65% of purchases allocated and received *Review student achievement, benchmark assessment, and course progression
*(Re)assess campus needs, outstanding purchase orders and RFP *Students begin Spring coursework
*Draft curricula, activities, and projects-based assignments in collaboration with industry partners (Years 3 & 4)
*Solicit stakeholder feedback regarding campus climate *Lottery selection for Cohort 2 students; notify applicants
*Finalize planning/logistics for summer bridge (Cohort 2); notify students

7. Project Evaluation and Modification

Describe how you will use project evaluation data to determine when and how to modify your program. If your benchmarks or summative SMART goals do not show progress, describe how you will use evaluation data to modify your program for sustainability.

Program evaluation of the T-STEM program at YMLA will be coordinated through the Fort Worth ISD (FWISD) Grant Compliance and Monitoring Department. Periodic feedback will be provided during in-person and discussed with program managers at least quarterly. Regular meetings will be held to discuss documentation, data collection, and any challenges/unforeseen aspects to implementing project components. Recommendations and modification will be reported and discussed during all meetings. The following points of information will be assessed as part of the proposed project: Planning, implementation, and evaluation of project activities: Planning and implementation will be monitored and data collected through meeting minutes, agenda, and documentation of process and product of grant activities. Student and stakeholder engagement be collected through qualitative data. These qualitative data will be cataloged and analyzed using Key-Words-in-Context (KWIC) approach. Patterns and trends will be reported quarterly. Stakeholders' Engagement: Involvement in planning activities by industry partners, parents, principals, teachers, and students will be gathered through the district on-line surveying tool to determine the extent of engagement indicators. Additionally, participation and activity logs will be collected to determine level of participation. These data will be reported during planning meetings. Provided services: Data for provided services will be collected through the Budget Office, Advisory board committee meetings, and YMLA planning documentation. The extent of product success will be assessed through focus groups, observations, and/or surveys. Feedback will be provided during planning meetings. Curriculum Development: The extent of curriculum implementation will be collected at the student level through the observation, local assessment/benchmark data meeting instructional objectives. Additionally, data such as learning minutes, training logs, and professional development will be reported to the campus management team. Data will be used in various campus ways to evaluate the implementation of the grant and the improvement of program planning success.

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

8. Statutory/Program Assurances

The following assurances apply to this grant program. In order to meet the requirements of the grant, the grantee must comply with these assurances.

Check each of the following boxes to indicate your compliance.

☒ 1. The applicant provides assurance that program funds will supplement (increase the level of service), and not supplant (replace) state mandates, State Board of Education rules, and activities previously conducted with state or local funds. The applicant provides assurance that state or local funds may not be decreased or diverted for other purposes merely because of the availability of these funds. The applicant provides assurance that program services and activities to be funded from this grant will be supplementary to existing services and activities and will not be used for any services or activities required by state law, State Board of Education rules, or local policy.

☒ 2. The applicant provides assurance that the application does not contain any information that would be protected by the Family Educational Rights and Privacy Act (FERPA) from general release to the public.

☒ 3. T-STEM Academies will implement the design elements included within the 6 benchmarks of the model's T-STEM Blueprint and strive to fulfill the state standard for student success as measured by the outcomes-based measures.

☒ 3. T-STEM Academies will provide participating students with flexibility in class scheduling and academic mentoring.

☒ 4. T-STEM Academies will be open enrollment. Enrollment decisions will not be based on state assessment scores, discipline, history, teacher recommendations, minimum grade point average (GPA) or any other criteria that create barriers for student enrollment.

☒ 5. T-STEM Academies will allow participating students to complete a STEM Endorsement and post-secondary credentials (an associate degree, a two-year postsecondary certificate, or industry based certification), and complete work-based learning experiences for all grades in the T-STEM Academy.

☒ 6. T-STEM Academies will be provided at no cost to participating students.

☒ 7. T-STEM Academies will pilot the STEM Framework and use the STEM Planning Guide and the STEM Sustainability Tool as part of the grant reporting.

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

Statutory Requirements

1. Describe the recruitment and enrollment plan. Include a general timeline and describe the specific activities planned to serve the target population.

The proposed T-STEM program at YMLA will be one of FWISD's Gold Seal Programs of Choice. The Gold Seal Programs at FWISD's comprehensive high schools connect classroom learning and real world applications. These programs offer college credit through dual credit, internships and mentorship, and licensures and certifications.

RECRUITMENT AND ENROLLMENT PLAN
Gold Seal recruiting and application begins in October and ends in December with some ongoing late applications allowed through May if needed. Parents and students are notified in February of their enrollment for the coming school year. Students are given the following weighted ranking order during the lottery process as determined through Board Policy and school model protocols:

*Gold Seal Programs of Choice Students living in the school's attendance zone
*Siblings of resident students who are concurrently enrolled in the school's Program of Choice
*Children of resident District employees
*Students living in the District but outside the attendance zone
*Children of non-resident District employees
*Students living outside of the District
*Admission is based on a computer-generated selection process.

The proposed YMLA lottery system will be a weighted lottery to meet the needs of the Texas Education agency T-STEM Blueprint Outcome Based Measure's.
*Identified as At-Risk
*Identified as Economically Disadvantaged

GENERAL TIMELINE:
September- October: Counselor & AVID Coordinator Training;
October: Middle School Mini Expos & Tours, AT RISK MS AVID & CTE Class Visits, Targeted Breakthrough Event.
November: Info Night, District EXPOs, Begin Application Process, Community Outreach & Neighborhood Open House;
December- Lottery for Applicants Begins;
January: Lottery Runs
February - May: Notification of Selections, Acceptance Confirmation Begins, Summer Bridge Notifications, 2nd Choice Applicants and Waiting List Processing Begins, TCC Enrollment;
June: Summer Bridge Program;
August: New Cohort Complete

ACTIVITIES TO SERVE AND RECRUIT THE TARGET POPULATION
The process will include recruitment through the Tarrant County College (TCC) TexPrep and GenHope programs, as well as middle school career cruising reports for students who are interested in the TSTEM technology fields. FWISD will deveop outreach programs such as individual letters and invitations to apply based on the OBM measures. The District will continue its POC marketing program with open houses, mini-expos, and the district expo.

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

| RFA/SAS # | 701-20-131/499-21 | 2021-2023 T-STEM Planning and Implementation Grant | Page 5 of 10 |

Statutory Requirements (Cont.)

2. Describe the learning pathway that the school is planning to offer and how it expands upon current offerings. Include how the learning pathway will enable a student to have a clear pathway from middle school to high school courses where they will have postsecondary opportunities and identify crosswalks, sequence of courses, degrees/certificate/certifications earned, and STEM work-based learning that will be available in each grade level served in the T-STEM Academy to students at every grade level. Describe how the selected course of study will address regional STEM pathways.

The Paul Laurence Dunbar Young Men's Leadership Academy (YMLA) is FWISD's first single-gender school for boys. YMLA is a school that will nurture the "whole" child to ensure that each student is successful in the classroom and in life. Our goal is to provide the education for young men to achieve their promise as students, as family members, and as engaged citizens. The Academy offers students a rigorous college preparatory curriculum that begins in 6th grade. As a college preparatory school, YMLA has a varied curriculum aimed at helping students acquire knowledge and develop critical thinking and problem solving skills in order for them to be successful in and out of the classroom. The primary objective of YMLA is to prepare young men for lives of responsibility and leadership in a globally competitive world. The students who graduate from YMLA will uphold the values of courage, honor and acceptance of responsibility for their actions. YMLA is committed to training the leaders of tomorrow who will change their communities, the nation and the world. The campus will provide students the ability to take college level courses and CTE courses in a full service T-STEM Early College High School.

FWISD partnered with the Tarrant Workforce Board to identify local areas of need within the identified high wage, high demand career fields. Students will work directly with Mechatronics, Robotics, Automation Engineering, and Business experts within Texas Instruments Incorporated. Students will attend The Mechatronics, Robotics, and Automation Engineering, and Business Summer Bridge program and Texas Success Initiative (TSI) summer workshop with T-STEM pathway students.

Together with TCC Faculty and our Industry Partner Texas Instruments, we will provide students with a well-rounded College Industry Orientation. Students in the T-STEM program will study robotic mechanisms, hydraulics, pneumatics, programmable logic controllers, electromechanical devices, microprocessors, and robotics. Students will also have the opportunity to gain a solid technical background and the manual skills to fabricate, test, install, operate and maintain automated equipment. Each student will engage in work-based learning at each grade level, earn a high school diploma with endorsements, and have opportunities to earn industry certifications and credentials and an associate degrees that can lead to a 4-year University.

Year1: All students will the take the Principals of Engineering course in their first year to begin the industry exploratory portion of their grade level work-based learning and will engage in co-curricular experiences to solidify their Mechatronics, Robotics, and Automation Engineering, and Business industry foundation.

Year 2: Students will gain industry experience while they take their first-year specialized college coursework with co-curricular opportunities to evaluate career pathways and have hands on access to industry parntner.

Year 3: Students will have access to hands on training with industry mentors while continuing their college course work.

Year 4: Students will have the opportunity to work with partners as interns, apprentices, or problem solvers of major global, regional, and local business issues.

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

| RFA/SAS # | 701-20-131/499-21 | 2021-2023 T-STEM Planning and Implementation Grant | Page 6 of 10 |

Statutory Requirements (Cont.)

3. Name the IHE and describe how the proposed program will meet the requirements for the partnership with the IHE.

YMLA will work in partnership with an Institute of Higher Education (IHE), Tarrant County College (TCC), through the use of a memorandum of understanding (MOU). The MOU outlines the partners' relationship and responsibilities with regard to curriculum alignment, instructional materials, instructional calendar, student enrollment and attendance, grading periods and policies and administration of statewide assessments and establishes courses of study that combine high school and postsecondary courses. A credit articulation guide adopted by the local school board will outline which courses qualify for dual credit. In addition, the MOU outlines embedded industry certification opportunities provided within the coursework. TCC is accredited to award associate degrees by the Southern Association of Colleges and Schools Commission on Colleges. Programs and courses are approved by the Texas Higher Education Coordinating Board. Additional memberships are held in the Texas Association of Community Colleges, the Association of Texas Colleges and Universities, and the American Association of Community Colleges. Classes will be scheduled in conjunction with the IHE's calendar to support the courses of study outlined in the MOU. Instructors for the courses will be provided by each institution to meet the needs of the T-STEM student course requests. Students will be provided course outlines in their courses of study under the advisement of both the high school counselor and IHE college advisor. Students who complete the course of study will earn both a high school diploma and a two-year Associate's Degree, and have the opportunity to complete industry certifications. Through the proposed project, students will have access to a new Career Exploration Interactive System to evolve their current paper tracker system to an on-line system with T-STEM specific elements. Included in the system would be an academic and program tracker, Mechatronics, Robotics, and Automation Engineering, and Business career interest survey, and on-line build electronic portfolios and resumes.

4. Name the regional industry or business partner and their role as a partner. Describe how the proposed partnership will support students in the STEM Programs of Study or their science and math pathway to the STEM Endorsement.

YMLA will enter into an MOU with its workplace partner Texas Instruments Incorporated (TI) to: Provide 100% of participating students access to appropriate work-based education at every grade level; Give students who receive work-based training or education from the partner under the T-STEM program first priority in interviewing for any jobs for which the student is qualified that are available on the student's completion of the program; and Review the agreement at least every two years and update as necessary. TI designs, manufactures, tests and sells analog and embedded semiconductors in markets that include industrial, automotive, personal electronics, communications equipment and enterprise systems. The Project Implementation Committee will work to design a flexible schedule of both secondary and post-secondary courses to allow students to arrive at high school graduation with both a high school diploma and an Associate Degree from TCC. One of the facets of this T-STEM program that sets it apart from others is a working partnership with STEM leader, TI. Through flexible scheduling and creative course-design, students in the YMLA T-STEM program will participate in regularly-scheduled, real-world work experiences that will give them an edge in their post-secondary careers. The Project Development Committee will meet regularly with both its IHE and Industry partner to continue to cultivate these relationships and to maintain scheduling that will meet the needs of all three entities, and most importantly, the students enrolled in the program. T-STEM staff will work with students to ensure that they are put on a rigorous, yet reasonable track to their T-STEM graduations. Ninth graders will begin by taking college level elective courses. In tenth grade, students will be enrolled in their first text-based college courses to prepare them for more advanced text-based courses in the eleventh and twelfth grades.

TEA Program Requirements

1. Describe the current leadership team. Include a list of the individuals, their title, and their stakeholder group. Also, include how often the leadership team will meet, the dates of meetings that have already been held, any upcoming meetings, and agenda topics.

Under the umbrella of the T-STEM Advisory Board will be the Program Implementation Committee consisting of District leaders from the campus, Leadership, CTE, Curriculum, and Advanced Academics. The Committee will include: David Saenz, Chief Innovation Officer: Masters Degree in Educational Administration; Ed.D. in Educational Leadership; Experience leading and managing a CTE program in a large urban setting; Proven track record of managing federal, state, and local budgets and resources; and experience with managing a high performing team of CTE and STEM professionals. Lisa Castillo, Executive Director of Innovation: Master's Degree in Counseling with extensive graduate coursework in Educational Administration; Currently working on Ed.D.; Certified as Principal and Superintendent; Experience leading and managing CCRSM programs in a large urban setting; Proven track record of student success; Experience with managing multiple CTE programs in a CTE center; and CTE program development and growth and student success. Rodney White, Principal: Master's Degree, and 10 years campus administrator experience. Amy Draper, Early College Program Director: Master's Degree in Education; Principal and Superintendent certified; Currently working on Ed.D. in Higher Education; and Experience managing specialized programs within CCRSM programs in a large urban setting. Daphne Rickard, Executive Director CTE: Master's Degree; Certified in educational administration; and Proven track record of CTE and STEM program development and growth. Dr. Stacy Burrell, Director of Grant Compliance and Monitoring will oversee program evaluation. Throughout the planning phase, the team met monthly to discuss topics such as partnerships, internships, budget, compliance, evaluation, professional development and curriculum.

2. Describe the current wrap-around strategies and services the campus is offering, as well as the additional strategies and services that are planned to support the T-STEM Academies.

YMLA works closely with students to stay abreast of the successes and struggles they face as they transition from middle school to high school and then throughout their high school career, taking both high school and college level courses. YMLA utilizes a daily advisory period for teachers to visit individually with a set group of assigned students. Through this method, most academic and social/emotional difficulties are discovered early on and solutions are determined. Should students require academic assistance, YMLA will partner with TCC and the Student Development Services department to increase dual-credit course success, e.g. Writing Center, Math Lab, Library, and Student Services. If the course is a high school course, students will have the opportunity to meet with the instructor to receive additional support and assistance. Every student placed in a work-based site will have a detailed training plan created by a teacher/advisor and signed by the student, parent, teacher, and employer. The teacher of record will regularly visit work-based sites to ensure that student needs are being met by the placement. All students in work-based learning courses will have regular contact with the teacher in the classroom setting throughout the year. YMLA and TCC will design and implement a referral mechanism for teachers to use for students that require more intensive support and interventions. YMLA will partner with TCC and their Student Development Services department to increase YMLA dual-credit course success, including additional support for underrepresented students. Additionally, YMLA is slated to receive a College & Career Readiness Coach (CCR) to use interventions focusing on proven, researched-based methods of increasing student and family understanding of the connection between school completion and long-term success in life. CCRs constantly monitor their students through the district's Dropout Early Warning System and refers students to services as identified.

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

Request for Grant Funds

List all of the allowable grant-related activities for which you are requesting grant funds. Include the amounts budgeted for each activity. Group similar activities and costs together under the appropriate heading. During negotiation, you will be required to budget your planned expenditures on a separate attachment provided by TEA.

Payroll Costs

#	Activity	Amount
1.		
2.		
3.		
4.		
5.		

Professional and Contracted Services

#	Activity	Amount
6.	FWISD Program Evaluation	$10,000
7.	T-STEM Planning Development and Collaboration Consultant	$35,000
8.		
9.		
10.		

Supplies and Materials

#	Activity	Amount
11.	Technology and Equipment	$74,290
12.		
13.		
14.		

Other Operating Costs

#	Activity	Amount
15.	Transportation, Travel, Workbased Learning Experiences	$25,000
16.		
17.		

Capital Outlay

#	Activity	Amount
18.		
19.		
20.		

Direct and indirect administrative costs: $5,710

TOTAL GRANT AWARD REQUESTED: $150,000

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.

Appendix I: Negotiation and Amendments

Leave this section blank when completing the initial application for funding.

An amendment must be submitted when the program plan or budget is altered for the reasons described in the "When to Amend the Application" document posted on the Administering a Grant page of the TEA website and may be mailed OR faxed (not both). **To fax:** one copy of all sections pertinent to the amendment (including budget attachments), along with a completed and signed page 1, to either (512) 463-9811 or (512) 463-9564. **To mail:** three copies of all sections pertinent to the amendment (including budget attachments), along with a completed and signed page 1, to the address on page 1. More detailed amendment instructions can be found on the last page of the budget template.

You may duplicate this page.

For amendments, choose the section you wish to amend from the drop down menu on the left. In the text box on the right, describe the changes you are making and the reason for them.

Always work with the most recent negotiated or amended application. If you are requesting a revised budget, please include the budget attachments with your amendment.

Section Being Negotiated or Amended	Negotiated Change or Amendment
[drop down]	
[drop down]	
[drop down]	
[drop down]	
[drop down]	

For TEA Use Only:
Adjustments on this page have been confirmed with _____ by _____ of TEA by phone / fax / email on _____.