#### 2020 Initiatives Abstract Form

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**Project Information** – Engagement

Project Title -Kids: Exercise, Fun & Food

**Project Duration:** one-year pilot

Expected Start date 9-1-2019 Expected End date 6-30-2020

Will your project require support from information Technology Services? No

## **Introduction/ Background**

The Kids: Exercise, Fun & Fitness program is coordinated through the School of Health Sciences. The mission of the program is to provide an interdisciplinary health and wellness program for individuals with intellectual or developmental disabilities (IDD). The key goals of the program are to engage community partners with IDD in fitness and nutrition education and provide Stockton students with hands-on experiences in a nutrition education and exercise programming. A partnership has been established through previous projects with Family Resource Network (FRN) and The Arc of Atlantic County. A previous project by the research team received a Flutie Foundation grant (\$10,000) which has allowed us to offer adolescents and adults with autism spectrum disorders (ASD) a fitness program for three 12-week sessions.

The national rate of children identified with ASD is 1 in 59 children. New Jersey rates are the highest in the nation at 1 in 34 children. These statistics demonstrate the need for opportunities and services for children with an ASD diagnosis in our state and specifically in the southeastern region of NJ. The proposed request is to provide services to children with ASD in our community.

## Propose/ Goal

Kids: Exercise, Fun & Food is proposed to be an exercise and nutrition literacy program aimed at helping children with ASD and a parent or caregiver to improve their well-being through physical activity and healthy eating utilizing an interprofessional team. The inclusion of both the child and the parent/caregiver is an important element to the program.

**Activities (Briefly outline the major action steps which will guide project)** 

Kids: Exercise, Fun, and Food will provide an exercise, nutrition and cooking program for children ages 8-15 with ASD. The cooking component adds a hands-on approach to introduce healthy food options and encourage eating new foods. The class environment will facilitate interaction with peers. The project will include parents and caregivers to encourage carryover of activities for improved healthy behaviors.

Timeline - Participants will engage in an 8-week, two hours per week program.

Week 1 - Informed consent and assent to participate will be completed in the first session as well as the pre-intervention data collection (height, weight, aerobic, strength, flexibility and balance measures) The Sensory Profile 2 will be filled out by the parent/caregiver.

Individual programs will be designed for each participant utilizing these data by the occupational therapist (OT) with assistance of graduate students from the occupational therapy (OT) and physical therapy (PT) programs.

## Week 2-7 - The exercise and nutrition program.

During the first hour, the participants will engage in physical activity/exercise. The participants will have choices of activities and modifications will be made to maximize participation. All the activities will be age appropriate and fun.

During the second hour, participants will engage in a cooking-nutrition class. Participants will learn basic nutrition principles, food safety, and prepare a food to consume. Participants will assist in the food preparation to their level of ability and adaptations will be made by the OT as needed. The sessions will be coordinated by the OT. Graduate assistants from the PT and OT programs will assist in planning and modification of activities. Undergraduate nursing students will assist with the nutrition program and health science students will work one-to-one with participants.

Week 8 - Post-intervention data will be collected with the same areas assessed in Week 1 except for the Sensory Profile 2 which is only used as a screening tool. Following data collection, a final cooking-nutrition class will be held.

Outcomes and Assessments (Briefly identify outcomes, including campus-wide impact; including campus-wide impact; indicate how you will measure success of your efforts; what metrics will be used, etc).

Community impact - 20 children with ASD will participate in weekly Kids: Exercise, Fun & Food sessions in the year-long program (10 per session, participants may participate in more than one 8-week session). 20 family members or support persons will participate in weekly Kids: Exercise, Fun & Food sessions.

Campus-wide impact - 20 graduate and undergraduate students in the SHS will gain understanding and experience engaging with children with ASD through interprofessional practice including the professions of Nursing, OT and PT.

### **Outcomes**;

- 1. Participants will demonstrate a 15% improved physical conditioning as seen by increased cardiovascular endurance, flexibility, strength, muscular endurance and balance (as measured by a pretest and post-test fitness assessment).
- 2. Participants will try a minimum of 2-3 new healthy foods throughout the course of the 8-week session (as measured by food log).
- 3. Participants will demonstrate a 50% increase their number of minutes engaged in physical activity to meet the national physical activity guidelines of 150 minutes per week (as measured by a pretest and post-test physical activity log).
- 4. Graduate and undergraduate students will acquire comprehensive knowledge and comfort in working with children with ASD, as measured by Societal Attitudes towards Autism Skill questionnaire (SATA).

# Measures or data gathering tools you are using to collect data

- 1. Anthropometric measures: pre/post body weight,
- 2. Vital Signs: resting heart rate, blood pressure
- 3. Fitness assessments pre/post: Body Mass Index, hip & waist circumference, body composition, Timed Up & Go, Children's version (TUG-IC), Sit & Reach, Stork Balance test, and 6-minute walk test.
- 4. Activity logs: Participants and parents/caregivers will be asked to record their baseline weekly physical activity at the initial data collection and at the post-data collection during week eight.
- 5. Food logs: Kids: Exercise, Fun & Food coordinator will observe and record new healthy foods tried by each participant. Parent/caregiver will complete a food log of new healthy foods tried at home during the 8-week session.

Outcomes will be reported in a peer-reviewed journal article and at national conferences.

### **Summary of Budget Request (Must be justified in full proposal)**

The costs to run the program include space, personnel time (coordinator, occupational therapist and graduate assistants), usage of exercise equipment, cooking supplies and equipment, and assessment tools. Funding of our project will help us to specifically address the health needs of children with ASD. Increasing activity and educating children and caregivers on healthy eating will help prevent obesity and co-morbidities including diabetes and cardiovascular disease. This grant would allow us to provide the program for free for participants and their families.

This project will serve as a pilot study with the intent of applying for external funding.

# Have you discussed this proposal with your supervision? (Dean)

Zahorodny, W., Shenouda, J., Mehta, U., Yee, E., Garcia, P., Rajan, M., & Goldfarb, M. (2018). Preliminary Evaluation of a Brief Autism Screener for Young Children. *Journal of developmental and behavioral pediatrics : JDBP*, *39*(3), 183–191. doi:10.1097/DBP.000000000000543

# **2020 Initiatives Proposal Form**

Thank you for your interest in submitting a proposal to the 2020 Initiatives process.

Please complete this form, save it to your hard drive, and then email a copy to: <a href="mailto:2020@stockton.edu">2020@stockton.edu</a>. Please copy your Dean/Director on the email. You will then be contacted by the appropriate 2020 Initiative Team representative/LEGS facilitators.

Proposals will be evaluated based on general criteria including the following:

- University-wide impact
- Clearly addressing one of the four LEGS themes from the 2020 strategic plan
- Specific budget details provided
- Realistic outcomes identified
- Assessment measures specified

# Please consider the following questions as helpful prompts:

## University-wide Objective(s)

- Does your proposal clearly address an issue relevant to your selected "primary strategic (LEGS) theme"?
- What specifically do you wish to accomplish with your project?
- How will Stockton, as a whole, benefit?

# **Expected Results**

- How will you know if your project is a success?
- What are your anticipated outcomes and specific measurements for success?
- Does your proposal clearly indicate the person(s) or department(s) that will assume responsibility for the various work tasks?
- What is your project's "finish line"?

General Application Information			
Your Name	M. Alysia Mastrangelo		
Your Email	m.alysia.mastrangelo@stockton.edu		
Title of Project	Kids: Exercise, Fun , and Food		
Project Leader	M. Alysia Mastrangelo		
LEGS Initiative Team Coach	Awilda Colon and John Smith		
Project Partner(s)	Mary Kientz and Joan Perks		
<b>Duration / Time Frame of Project</b>	9/1/2019 - 6/1/2020		

Prop	oosal Category (choose one: one-ti	me or ongoing)
One-Time Event or Activity		Ongoing Event or Activity
	(A) \$5,000 or less	(C) \$5,000 or less
V	(B) More than \$5,000	(D) More than \$5,000

الة	tegic Theme (choose one)			
	Learning			
	Engagement			
1	Global Perspectives			
1	Sustainability			
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aı	egic Objectives: choose one primary (P) in ma In any themes	iiii tiie	eme and up to three secondary (5)	
arı	ning			
	Deliver high value-added learning experiences and promote scholarly activity (S1)	Translational Control of Control	Reward scholarly applications (ER2)	
	Promote liberal arts ideal to develop lifelong learners (S2)	-	Establish additional revenue sources (RS1-L)	
	Strengthen internal processes to support learning (IP1-L)	-	Reduce expenses (RS2-L)	
	Develop faculty and staff skills to support learning (ER1-L)	_	Align resources to support strategic plan (RS3-L)	
ga	igement			
T	Establish Stockton as an integral part of the identity of			
-	students, faculty, staff, alumni, and community members (S3)	S ▼	Foster an interactive environment among students, faculty, staff, and community (ER3)	
	Prepare students for active citizenship role (S4)	P▼	Increase opportunities for interactions between interrand external communities (ER4)	
	Create mutually reinforcing intellectual and co-curricular experiences (S5)	-	Establish additional revenue sources (RS1-E)	
	Strengthen internal processes to support engagement (IP1-E)	-	Reduce expenses (RS2-E)	
	Develop faculty and staff skills to support engagement (ER1-E)	_	Align resources to support the strategic plan (RS3-E)	
b	al Perspectives			
	Develop a globally diverse Stockton community (S6)		Strengthen opportunities for global interaction among members of the Stockton community (ER5)	
	Enhance capacity to participate globally (S7)	-	Establish additional revenue sources (RS1-G)	
	Strengthen internal processes to support global education (IP1-G)	-	Reduce expenses (RS2-G)	
	Integrate global program efforts among multiple units of the university (IP2)	-	Align resources to support the strategic plan (RS3-G	
	Develop faculty and staff skills to support global education (ER1-G)			
sta	ainability			
	Increase sustainable infrastructure (S8)		Develop and implement sustainability programs (IP5)	
-	Enhance sustainability education and research (S9)	-	Develop faculty and staff skills to support sustainabilit (ER1-S)	
	Increase recognition as a model of sustainability (S10)	J _	Reward sustainable practices (ER6)	
-	Partner to promote global sustainability (S11)	-	Establish additional revenue sources (RS1-S)	
	Strengthen internal process to support sustainability (IP1-S)	-	Reduce expenses (RS2-S)	
	Prioritize sustainability in plan operations and residential life (IP3)	-	Align resources to support the strategic plan (RS3-S)	
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The tables below allow for summaries of about 350 words. Additional information can be included as an attachment.

# **Narrative Summary of Project**

Kids: Exercise, Fun & Fitness program is coordinated through the SHS. The key goals of the program are to engage community partners with Autism Spectrum Disorder (ASD) in fitness and nutrition education and provide Stockton students with hands-on experiences in a nutrition education and exercise programming.

The national rate of children identified with ASD is 1 in 59 children. New Jersey rates are the highest in the nation at 1 in 34 children. Kids: Exercise, Fun & Food will be an exercise and nutrition literacy program aimed at helping children with ASD and a parent or caregiver to improve their well-being through physical activity and healthy eating utilizing an interprofessional team. The inclusion of both the child and the parent/caregiver is an important element to the program.

The program will be for children ages 8-15 and provide an appropriate environment for children with ASD. The cprogram will facilitate interaction with peers and will include parents and caregivers.

### Assessment Plan: What are your anticipated outcomes and specific measurements for success?

## Participants will

- 1. demonstrate a 15% improved physical conditioning as seen by increased cardiovascular endurance, flexibility, strength, muscular endurance and balance
- 2. try a minimum of 2-3 new healthy foods throughout the course as measured by food log
- 3. demonstrate a 50% increase in their number of minutes engaged in physical activity to meet the national physical activity guidelines as measured by the physical activity log.
- 4. Graduate and undergraduate students will acquire comprehensive knowledge and comfort in working with children with ASD, as measured by Societal Attitudes towards Autism Skill questionnaire.

### Measures:

- 1. Anthropometric measures
- 2. Vital Signs
- 3. Fitness assessments pre/post
- 4. Activity logs
- 5. Food logs:

Outcomes will be reported in a peer-reviewed journal article and at national conferences.

	ltem	<b>FY2019</b> July 1, 2018 – June 30, 2019	<b>FY2020</b> July 1, 2019 – June 30, 2020	<b>FY2021</b> July 1, 2020 – June 30, 2021	<b>FY2022</b> July 1, 2021 – June 30, 2022	Notes/Comments (stipends, supplies, hospitality etc.)
1.	Nutritional items for cookin	оскалова в виде со котролиться от околучиция для в от от да продавал	\$ 800.00			erritigani materia kalenderia kan musukenika kara yi tubeh denambilika kisakerina da kinakerina ma
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3.	Accelerometers for particip	dik arang na matura agus na daka ang kanang tang ang ang ang ang ang ang ang ang ang	\$ 500.00		оврем (Тинун на очени овети при на очени на очени овети об очени овети об очени овети об очени овети об очени о	орожиту на нанимата и бългат объяго розили ления на сего то се от странова до до того него до от от сего до от от с
4.	Cooking supplies	and 20 mention (GG), and GG/2010 to the section (GG) of GG 2010 to the section (GG), and GG 2014 to the section (GG).	\$ 300.00	anders over the first and the design and the first and the second and the second and the second and the second	e servir da la langui rinno e servira ficini sol de pope en re Per la libritar e se es sus estamente consecució	
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6.	Incentives for participation		\$ 400.00			
7.	Assessment tool - Sensory		\$ 50.00	anterprincipal de la servicio de la companya de la		
	Total	\$ 0.00	\$ 5,430.00	\$ 0.00	\$ 0.00	medies ze pyant szincemen reppillisti jakoz i i dat jak ez mediese jakoz i loszelek majatok hásti éskezekerenin májatak há

<sup>\*</sup> Please note: a proposal can only receive 2020 funding for two fiscal years.

Funding Questions		
Are you receiving any other University funding for this project?	No	
What department or academic school will your budget for this project reside?	School of Health Sciences	
Who will be the Budget Unit Manager (BUM)?	Dr. Margaret Slusser	
Who will be the budget processor?	Nikita Lively	
If you are requesting 2020 funding to hire a TES or consultant, is that person a current Stockton employee?	Yes, Currently Paid as alan: Adjunct Faculty Staff TES	⊙ No
Will you need 2020 funds for immediate use to begin your project?	Yes, Date Needed:	No

Additional Support Questions		
Will your project require support from Information Technology Services?	Yes	● No
If so, please provide details:	é	
Will your project require support from Plant/Facilities & Operations?	Yes	● No
If so, please provide details:		

Supervisor Approval/Support^		
Have you discussed your 2020 proposal with your supervisor, director, and/or dean and received their support?	Yes, the abstract was shared on 2/8/19	

<sup>^</sup> Please note: proposers who answer "no" to this question may be required to submit additional documentation in support of their 2020 application form.