



Training Proposal for:

FormFactor, Inc

Agreement Number: ET17-0249

Panel Meeting of: October 28, 2016

ETP Regional Office: San Francisco Bay Area

Analyst: L. Lai

PROJECT PROFILE

Contract Attributes:	Priority Rate Retrainee	Industry Sector(s):	Manufacturing Priority Industry: <input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Counties Served:	Alameda, San Diego, Santa Clara	Repeat Contractor:	<input checked="" type="checkbox"/> Yes <input type="checkbox"/> No
Union(s):	<input type="checkbox"/> Yes <input checked="" type="checkbox"/> No		
Number of Employees in:	CA: 685	U.S.: 1,120	Worldwide: 1,500
<u>Turnover Rate:</u>	6%		
<u>Managers/Supervisors:</u> (% of total trainees)	11%		

FUNDING DETAIL

Program Costs	-	(Substantial Contribution)	(High Earner Reduction)	=	Total ETP Funding
\$148,050		\$0	\$0		\$148,050

In-Kind Contribution:	100% of Total ETP Funding Required	\$188,550
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TRAINING PLAN TABLE

Job No.	Job Description	Type of Training	Estimated No. of Trainees	Range of Hours		Average Cost per Trainee	Post-Retention Wage
				Class / Lab	CBT		
1	Retrainee Priority Rate	Business Skills, Computer Skills, Continuous Impr, Mfg. Skills, PL-Mfg. Skills	235	8 - 200	0-24	\$630	*\$16.46
				Weighted Avg: 35			

*It will be made a condition of contract that the trainees in this Job Number will never be paid less than the State or local minimum wage rate as in effect at the end of retention regardless of the wage expressed in this table. The highest minimum wage rate will prevail.

Minimum Wage by County: \$16.46 for San Diego County; \$17.02 for Alameda and Santa Clara counties.

Health Benefits: Yes No This is employer share of cost for healthcare premiums – medical, dental, vision.

Used to meet the Post-Retention Wage?: Yes No Maybe
Up to \$1.65 per hour may be used to meet the Post-Retention Wage.

Wage Range by Occupation		
Occupational Titles	Wage Range	Estimated # of Trainees
Admin / Sales / Finance / Marketing Staff		15
Production Staff / Operators		40
Technician / Lead / Project / Product Manager*		120
IT Professional / Engineer		30
Technical Director**		5
Supervisor		15
Manager		10

*Project/Product Managers are individual contributors and spend over 51% of their time producing products or services; thus, they are not included in the manager occupational category or the 20% cap.

**Technical Directors are individuals who spend over 51% of their time producing products or services. They are higher-salaried engineers with a Director title but do not make corporate policy or manage other employees directly.

INTRODUCTION

Founded in 1993, FormFactor, Inc. (FFI) (www.formfactor.com) designs, develops, manufactures, sells and supports precision, high performance advanced semiconductor wafer probe card products and solutions. FFI products are based on proprietary technologies, including MicroSpring interconnect technology for applications that require reliability, speed, precision and signal integrity. FFI is headquartered in Livermore with locations in San Jose and Carlsbad. All three locations will participate in training.

PROJECT DETAILS

This is FFI's third ETP project. The first Agreement focused on manufacturing training as FFI brought manufacturing back to California. The second Agreement focused on new products and training Microprobe, Inc. employees in San Jose and Carlsbad as a result of a merger that was completed in early 2015. Some course names may be similar to those provided in the prior ETP Agreement; however, there is no duplication of courses.

Training will be delivered in new product lines and equipment, new technologies, and improvement processes. This past July, FFI completed the acquisition of Cascade Microtech in Oregon, expanding the Company's product lines and increasing market share in the foundry and logic probe card business. Employees will need to be trained on these products and equipment. Additionally, the Company will need to increase speed while reducing power consumption. This requires the Company to consistently improve processes, develop new technologies, test and troubleshoot new products, implement quality systems, and cross-train employees for a more flexible workforce.

Training Plan

Training will be conducted via Class/Lab, Computer-Based Training, and Productive Lab methodologies. In-house subject matter experts will deliver training. Vendors may be used.

Business Skills (5%): Training will be offered to Admin Staff, Sales Staff, Marketing Staff, Finance Staff, Product Managers, and Supervisors. Training is needed for employees to become familiar with products, improve accounting expertise, and provide superior customer service. Training will provide employees skills to coach others, give professional presentations, position the Company's products, and manage projects within their work areas.

Computer Skills (10%): Training will be offered to all occupations. Engineers, Managers, Supervisors, IT, and Admin Staff will learn new and upgraded systems such as MS Office, ADP, CAD programming and Agile. Production Staff will learn how to use manufacturing computer systems such as Agile, Lync and Document Change Orders system. Training is intended to increase output and accuracy of daily tasks.

Continuous Improvement (10%): Training will be offered to all occupations. Training will focus on Problem Solving, Product/Process Improvement, Root Cause Analysis, and Quality Improvement. Training is intended to develop teamwork and improve quality and workflow processes.

Manufacturing Skills (20%): Training will be offered to Production Staff, Operators, Technicians, Leads, Engineers, Supervisors, and Managers. Cross-training will improve workers' technical knowledge and skillsets. Training will improve manufacturing processes and decrease costs. Engineers will be trained on new design processes to develop new product designs and manufacturing processes. Supervisors and Managers will learn about the products and processes to ensure quality.

Productive Lab (55%):

FFI is requesting Productive Lab in Manufacturing Skills for 50 Production Staff, Technicians, Operators, and Leads. The majority of PL will be used to cross-train workers on the many production lines/procedures. The trainer-to-trainee ratio will not exceed 1:1, and training will not exceed 60 hour per trainee.

PL training will be taught by subject matter experts. Because the equipment is expensive, FFI requires employees to be company certified in processes prior to working on the manufacturing line independently. Each tool/process could take anywhere from two weeks to six months of

training to become certified. Also, in many job functions, the only way to stay proficient with changes is through PL.

Temp-to-Perm Employees

FFI intends to train 20 workers under the Panel Temporary-to-Permanent guidelines. The Company has retained these employees on a temporary basis, with the intention of hiring them into full-time, permanent positions after training. According to FFI, the average time for “converting” temporary workers into full-time permanent employment is six months. It is expected that these workers will receive employer-paid share-of-cost for healthcare premiums while on temporary status. Workers will receive health benefits immediately upon hire into full-time permanent employment.

Under Panel guidelines for the Temporary-to-Permanent program, these trainees must be eligible to participate in ETP-funded training pursuant to Unemployment Insurance Code Section 10201(c). Moreover, they cannot be enrolled as trainees until after they have been hired by FFI into full-time, permanent employment. Until they are so hired, retention and post-retention wage requirements cannot be satisfied and the Company will not receive progress payments.

Commitment to Training

ETP funds will not displace the existing financial commitment to training. Safety training is, and will continue to be, provided in accordance with all pertinent requirements under state and federal law. FFI’s 2016 training budget was approximately \$115,000 for all three facilities, and was primarily allocated to new-hire orientation, temporary worker training, compliance training, health & safety, basic computer skills, and department specific training requests.

➤ Training Infrastructure

Training at each site will be coordinated and scheduled by a management team consisting of a Director, Managers, and Supervisors. An administrative subcontractor will assist with tracking, drops, invoices, reports, modifications, roster compliance and completeness.

Substantial Contribution

No substantial contribution will be applied because FFI did not earn over \$250,000 at a single facility (see Active and Prior Projects).

RECOMMENDATION

Staff recommends approval of this proposal.

PRIOR PROJECTS

The following table summarizes performance by FFI under an ETP Agreement that was completed within the last five years:

Agreement No.	Location (City)	Term	Approved Amount	Payment Earned \$ %
ET15-0131	Livermore, San Jose, Carlsbad	07/01/2014–06/30/2016	\$148,500	\$144,502 (97%)
ET13-0348	Livermore	04/29/2013–04/28/2015	\$99,360	\$99,360 (100%)

DEVELOPMENT SERVICES

FFI retained CTA in Rocklin to assist with development of this proposal for a flat fee of \$2,500.

ADMINISTRATIVE SERVICES

FFI also retained CTA to perform administrative services in connection with this proposal for a fee not to exceed 13% of payment earned.

TRAINING VENDORS

To Be Determined

Exhibit B: Menu Curriculum**Class/Lab Hours**

8 - 200

Trainees may receive any of the following:

BUSINESS SKILLS

- Customer Satisfaction
- Effective Communications
- FormFactor Product Knowledge
- Managing Projects, Products, Customers
- Organizing Workflow and Schedules
- Presentation Skills (Technical/Non-Technical)
- Sales / Negotiation Techniques
- Strategic Planning
- Technical Training Delivery Skills (Train-the-Trainer)

COMPUTER SKILLS

- Automatic Data Processing Software ADP
- Document Change Order System
- Engineering and Development Tools
- Enterprise Resource Management system
- Lync Communication Tools
- Manufacturing Information System (Agile, ATRE)
- Microsoft Access, Project Tools, Dynamics
- Microsoft Tools Excel & Word (Intermediate/Advanced)
- Windows 10 Operating Systems

CONTINUOUS IMPROVEMENT

- Handling Difficult Situations--Conflict Management
- HPWT – High Performance Work Teams
- ISO 14001/ISO 9001
- Leadership / Coaching Skills
- Performance Management
- Problem Solving
- Product / Process Improvement
- Quality Improvement (Product / Operations)
- Root Cause Analysis
- SPC / 5S: Sort, Set , Shine, Standardize, Sustain
- Team Meetings for Quality Improvement

MANUFACTURING SKILLS

- Assembly / Test / Reliability
- CASCADE Technology
- Core Trainer
- Engineering Process Concepts
- Equipment Maintenance

- Fabrication (FAB / FAB2)
- Hazardous Communications / Safety
- Lean Manufacturing
- Manufacturing Processes
- Material Handling / Equipment Safety
- New Product Design/Development
- Operating Production Equipment
- Product Repair / Inspection
- Sequoia Equipment
- Shift Priorities / Work Instruction
- Shipping / Receiving Procedures
- SoC Technology
- Soldering, Etching, Engraving, Lapping, Kitting
- Vector Training / Promis
- Warehouse Inventory Procedures

PL Hours

0 - 60

MANUFACTURING SKILLS (1:1 trainer-to-trainee ratio)

- Equipment Maintenance
- Material Handling
- New Equipment Knowledge/Certification
- Operating Production Equipment
- Production & Assembly Processes
- Troubleshooting /Testing / Reliability / Repair / Inspection

CBT Hours

0 - 24

BUSINESS SKILLS

- Effective Communications (8 hrs)
- Finance for non-Financial (8 hrs)
- Internal Quality Audit (2 hrs)
- Supervisor Annual Refresher (1 hr)

COMPUTER SKILLS

- CAD programming (8 hrs)
- Camtasia Studio 8 (6.25 hrs)
- ERP Systems (BaaN, Agile) (8 hrs)
- Excel 2010: Advanced Formatting (3 hrs)
- Excel 2010: Charts (3.50 hrs)
- Excel 2010: Data Validation (1 hr)
- Excel 2010: Financial (2.25 hrs)
- Excel 2010: Macros (2.75 hrs)
- Excel 2010: Managing Multiple Worksheets/Workbooks (1.50 hrs)
- Excel 2010: Pivot Tables (3.75 hrs)
- PowerPoint 2010 Shortcuts (2.50 hrs)
- PowerPoint Business Presentation (3 hrs)

MANUFACTURING SKILLS

- Confined Space (2 hrs)
- HazCom-Global Harmonization System (2 hrs)
- Laser Safety (8 hrs)
- Radiation (1 hrs)
- Supervisory Safety (1 hrs)
- Wastewater Operations (2 hrs)

Note: Reimbursement for retraining is capped at 200 total training hours per trainee, regardless of the method of delivery. CBT is capped at 50% of total training hours, per trainee. PL is capped at 60 hours per-trainee.