



# TORO Analysis of Helpers--Production Workers to Textile Cutting Machine Setters, Operators, and Tenders

## INPUT SECTION:

Transfer	Title	O*NET	Filters		
From Title:	Helpers--Production Workers	51-9198.00	Abilities:	Importance Level: 50	Weight: 1
To Title:	Textile Cutting Machine Setters, Operators, and Tenders	51-6062.00	Skills:	Importance Level: 69	Weight: 1
Labor Market Area:	Maine Statewide		Knowledge:	Importance Level: 69	Weight: 1

## OUTPUT SECTION:

Grand TORQ:



80

Ability TORQ		Skills TORQ		Knowledge TORQ	
Level	88	Level	77	Level	77

Gaps To Narrow if Possible				Upgrade These Skills				Knowledge to Add			
Ability	Level	Gap	Impt	Skill	Level	Gap	Impt	Knowledge	Level	Gap	Impt
Rate Control	46	14	56	No Skills Upgrade Required!				No Knowledge Upgrades Required!			
Reaction Time	51	14	50								
Visual Color Discrimination	46	12	56								
Visualization	50	13	50								
Arm-Hand Steadiness	55	7	65								
Hearing Sensitivity	39	7	50								
Category Flexibility	41	6	50								
Multilimb Coordination	48	4	62								
Manual Dexterity	46	4	59								
Information Ordering	41	4	53								
Finger Dexterity	44	3	56								
Problem Sensitivity	42	3	53								
Speech Clarity	35	3	50								
Depth Perception	37	2	53								
Auditory Attention	41	2	53								
Deductive Reasoning	39	2	50								
Speech Recognition	35	1	53								



LEVEL and IMPT (IMPORTANCE) refer to the Target Textile Cutting Machine Setters, Operators, and Tenders. GAP refers to level difference between Helpers--Production Workers and Textile Cutting Machine Setters, Operators, and Tenders.

ASK ANALYSIS			
Ability Level Comparison - Abilities with importance scores over 50			
Description	Helpers--Production Workers	Textile Cutting Machine Setters, Operators, and Tenders	Importance
Arm-Hand Steadiness	48	55	65
Multilimb Coordination	44	48	62
Manual Dexterity	42	46	59
Control Precision	50	50	59
Near Vision	48	48	59
Finger Dexterity	41	44	56
Rate Control	32	46	56
Trunk Strength	48	42	56
Visual Color Discrimination	34	46	56
Oral Comprehension	44	42	53
Problem Sensitivity	39	42	53
Information Ordering	37	41	53
Depth Perception	35	37	53
Auditory Attention	39	41	53
Speech Recognition	34	35	53
Deductive Reasoning	37	39	50
Category Flexibility	35	41	50
Perceptual Speed	42	39	50
Visualization	37	50	50
Reaction Time	37	51	50
Static Strength	39	39	50
Hearing Sensitivity	32	39	50
Speech Clarity	32	35	50
Skill Level Comparison - Abilities with importance scores over 69			
Description	Helpers--Production Workers	Textile Cutting Machine Setters, Operators, and Tenders	Importance
Knowledge Level Comparison - Knowledge with importance scores over 69			
Description	Helpers--Production Workers	Textile Cutting Machine Setters, Operators, and Tenders	Importance

Experience & Education Comparison	
Related Work Experience Comparison	Required Education Level Comparison



Helpers--Production Workers		Textile Cutting Machine Setters, Operators, and Tenders	
10+ years	0%	9%	
8-10 years	0%	0%	
6-8 years	0%	0%	
4-6 years	0%	0%	
2-4 years	0%	0%	
1-2 years	13%	31%	
6-12 months	39%	9%	
3-6 months	7%	2%	
1-3 months	1%	9%	
0-1 month	10%	2%	
None	27%	33%	

  

Helpers--Production Workers		Textile Cutting Machine Setters, Operators, and Tenders	
Doctoral	0%	0%	
Professional Degree	0%	0%	
Post-Masters Cert	0%	0%	
Master's Degree	0%	0%	
Post-Bachelor Cert	0%	0%	
Bachelors	0%	0%	
AA or Equiv	0%	0%	
Some College	0%	27%	
Post-Secondary Certificate	11%	8%	
High School Diploma or GED	51%	43%	
No HSD or GED	36%	20%	

Helpers--Production Workers	Textile Cutting Machine Setters, Operators, and Tenders
<b>Most Common Educational/Training Requirement:</b>	
Short-term on-the-job training	Moderate-term on-the-job training
<b>Job Zone Comparison</b>	
<p><b>1 - Job Zone One: Little or No Preparation Needed</b></p> <p>No previous work-related skill, knowledge, or experience is needed for these occupations. For example, a person can become a cashier even if he/she has never worked before.</p> <p>These occupations may require a high school diploma or GED certificate. Some may require a formal training course to obtain a license.</p> <p>Employees in these occupations need anywhere from a few days to a few months of training. Usually, an experienced worker could show you how to do the job.</p>	<p><b>3 - Job Zone Three: Medium Preparation Needed</b></p> <p>Previous work-related skill, knowledge, or experience is required for these occupations. For example, an electrician must have completed three or four years of apprenticeship or several years of vocational training, and often must have passed a licensing exam, in order to perform the job.</p> <p>Most occupations in this zone require training in vocational schools, related on-the-job experience, or an associate's degree. Some may require a bachelor's degree.</p> <p>Employees in these occupations usually need one or two years of training involving both on-the-job experience and informal training with experienced workers.</p>

<b>Tasks</b>	
Helpers--Production Workers	Textile Cutting Machine Setters, Operators, and Tenders
Core Tasks	Core Tasks
<p>Generalized Work Activities:</p> <ul style="list-style-type: none"> <li>• Handling and Moving Objects - Using hands and arms in handling, installing, positioning, and moving materials, and manipulating things.</li> <li>• Performing General Physical Activities - Performing physical activities that require considerable use of your arms and legs and moving your whole body, such as climbing, lifting, balancing, walking, stooping, and handling of materials.</li> <li>• Controlling Machines and Processes - Using either control mechanisms or direct physical activity to operate machines or processes (not including computers or vehicles).</li> <li>• Getting Information - Observing, receiving, and otherwise obtaining</li> </ul>	<p>Generalized Work Activities:</p> <ul style="list-style-type: none"> <li>• Inspecting Equipment, Structures, or Material - Inspecting equipment, structures, or materials to identify the cause of errors or other problems or defects.</li> <li>• Monitor Processes, Materials, or Surroundings - Monitoring and reviewing information from materials, events, or the environment, to detect or assess problems.</li> <li>• Repairing and Maintaining Mechanical Equipment - Servicing, repairing, adjusting, and testing machines, devices, moving parts, and equipment that operate primarily on the basis of mechanical (not electronic) principles.</li> <li>• Controlling Machines and Processes - Using either control mechanisms or direct</li> </ul>



information from all relevant sources.

- Identifying Objects, Actions, and Events - Identifying information by categorizing, estimating, recognizing differences or similarities, and detecting changes in circumstances or events.

Specific Tasks

Occupation Specific Tasks:

- Attach slings, ropes, and cables to objects such as pipes, hoses, and bundles.
- Break up defective products for reprocessing.
- Change machine gears, using wrenches.
- Clean and lubricate equipment.
- Count finished products to determine if product orders are complete.
- Cut or break flashing from materials or products.
- Dump materials such as prepared ingredients into machine hoppers prior to mixing.
- Examine products to verify conformance to quality standards.
- Fold products and product parts during processing.
- Help production workers by performing duties of lesser skill, such as supplying or holding materials or tools, and cleaning work areas and equipment.
- Lift raw materials, finished products, and packed items, manually or using hoists.
- Load and unload items from machines, conveyors, and conveyances.
- Mark or tag identification on parts.
- Measure amounts of products, lengths of extruded articles, or weights of filled containers to ensure conformance to specifications.
- Mix ingredients according to specified procedures and formulas.
- Observe equipment operations so that malfunctions can be detected, and notify operators of any malfunctions.
- Operate machinery used in the production process, or assist machine operators.
- Pack and store materials and products.
- Pack food products in paper bags and boxes, and stack them in warehouses and coolers.
- Perform minor repairs to machines, such as replacing damaged or worn parts.
- Place products in equipment or on work surfaces for further processing, inspecting, or wrapping.
- Position spouts or chutes of storage bins so that containers can be filled.
- Prepare raw materials for processing.
- Read gauges and charts, and record data

Using either control mechanisms or direct physical activity to operate machines or processes (not including computers or vehicles).

- Getting Information - Observing, receiving, and otherwise obtaining information from all relevant sources.
- Handling and Moving Objects - Using hands and arms in handling, installing, positioning, and moving materials, and manipulating things.

Specific Tasks

Occupation Specific Tasks:

- Adjust cutting techniques to types of fabrics and styles of garments.
- Adjust machine controls, such as heating mechanisms, tensions, and/or speeds to produce specified products.
- Clean, oil, and lubricate machines, using air hoses, cleaning solutions, rags, oilcans, and grease guns.
- Confer with coworkers to obtain information about orders, processes, or problems.
- Inspect machinery to determine whether repairs are needed.
- Inspect products to ensure that specifications are met and to determine whether machines require adjustment.
- Install, level, and align components, such as gears, chains, guides, dies, cutters, and/or needles to set up machinery for operation.
- Notify supervisors of mechanical malfunctions.
- Operate machines for test runs to verify adjustments and to obtain product samples.
- Operate machines to cut multiple layers of fabric into parts for articles such as canvas goods, house furnishings, garments, hats, or stuffed toys.
- Place patterns on top of layers of fabric and cut fabric following patterns, using electric or manual knives, cutters, or computer numerically controlled cutting devices.
- Program electronic equipment.
- Record information about work completed and machine settings.
- Repair or replace worn or defective parts or components, using hand tools.
- Start machines, monitor operations, and make adjustments as needed.
- Stop machines when specified amounts of product have been produced.
- Study guides, samples, charts, and specification sheets; or confer with supervisors or engineering staff to determine setup requirements.
- Thread yarn, thread, or fabric through guides, needles, and rollers of machines



obtained.

- Record information such as the number of products tested, meter readings, and dates and times of product production.
- Remove products, machine attachments, and waste material from machines.
- Separate products according to weight, grade, size, and composition of materials used to produce them.
- Signal coworkers to direct them to move products during the production process.
- Start machines or equipment in order to begin production processes.
- Thread ends of items such as thread, cloth, and lace through needles and rollers, and around take-up tubes.
- Tie products in bundles for further processing or shipment, following prescribed procedures.
- Transfer finished products, raw materials, tools, or equipment between storage and work areas of plants and warehouses, by hand or using hand trucks or powered lift trucks.
- Turn valves to regulate flow of liquids or air, to reverse machines, to start pumps, or to regulate equipment.
- Unclamp and hoist full reels from braiding, winding, and other fabricating machines, using power hoists.
- Wash work areas, machines, equipment, vehicles, and products.

Detailed Tasks

Detailed Work Activities:

- adjust production equipment/machinery setup
- attach or mark identification onto products or containers
- clean equipment or machinery
- clean rooms or work areas
- examine products or work to verify conformance to specifications
- load or unload material or workpiece into machinery
- load, unload, or stack containers, materials, or products
- lubricate machinery, equipment, or parts
- maintain or repair industrial or related equipment/machinery
- maintain production or work records
- measure, weigh, or count products or materials
- mix paint, ingredients, or chemicals, according to specifications
- monitor production machinery/equipment operation to detect problems
- move or fit heavy objects
- operate food processing production equipment/machinery

guides, needles, and rollers of machines.

Detailed Tasks

Detailed Work Activities:

- adjust production equipment/machinery setup
- clean equipment or machinery
- confer with engineering, technical or manufacturing personnel
- examine products or work to verify conformance to specifications
- inspect machinery or equipment to determine adjustments or repairs needed
- install equipment or attachments on machinery or related structures
- load or unload material or workpiece into machinery
- maintain consistent production quality
- maintain or repair industrial or related equipment/machinery
- monitor production machinery/equipment operation to detect problems
- move or fit heavy objects
- operate textile production equipment/machinery
- perform safety inspections in manufacturing or industrial setting
- read specifications
- read work order, instructions, formulas, or processing charts
- recognize characteristics of cloth or fabric
- set up production equipment or machinery
- understand technical operating, service or repair manuals
- use hand or power tools
- use precision measuring tools or equipment

Technology - Examples



- operate hoist, winch, or hydraulic boom
- operate metal or plastic fabricating equipment/machinery
- operate ore refining/foundry equipment/machinery
- operate packaging or banding machine or equipment
- operate pulp or paper making equipment
- operate textile production equipment/machinery
- operate woodworking equipment/machinery
- package goods for shipment or storage
- perform repetitive tasks in assembly setting
- perform safety inspections in manufacturing or industrial setting
- read work order, instructions, formulas, or processing charts
- signal directions or warnings to coworkers
- sort manufacturing materials or products
- wrap products

Technology - Examples

Data base user interface and query software

- Data entry software

Spreadsheet software

- Microsoft Excel

Word processing software

- Microsoft Word

Tools - Examples

- Adjustable wrenches

- Hand files

- Industrial platform scales

- Forklifts

- Grease guns

- Claw hammers

- Handtrucks

- Power hoists

- Hydraulic booms

- Hand jacks

- Label-making machines

- Platform ladders

- Locking pliers



- Personal computers
- Planing tools
- Jackhammers
- Power drills
- Power grinders
- Power nail guns
- Power sanders
- Power saws
- Pressure wands
- Hand saws
- Phillips head screwdrivers
- Skid steer loaders
- Material-hoisting slings
- Power staple guns
- Measuring tapes
- Utility knives
- Industrial vacuum cleaners
- Hydraulic winches

### Labor Market Comparison

Description	Helpers--Production Workers	Textile Cutting Machine Setters, Operators, and Tenders	Difference
Median Wage	\$ 22,260	\$ 24,860	\$ 2,600
10th Percentile Wage	\$ 17,160	\$ 15,530	\$( 1,630)
25th Percentile Wage	N/A	N/A	N/A
75th Percentile Wage	\$ 25,210	\$ 29,340	\$ 4,130
90th Percentile Wage	\$ 30,870	\$ 33,940	\$ 3,070
Mean Wage	\$ 23,130	\$ 24,400	\$ 1,270
Total Employment - 2007	1,490	110	-1,380
Employment Base - 2006	1,522	104	-1,418
Projected Employment - 2016	1,365	90	-1,275
Projected Job Growth - 2006-2016	-10.3 %	-13.5 %	-3.2 %

Projected Annual Openings - 2006-2016	37	4	-33
---------------------------------------	----	---	-----

### National Job Posting Trends

Trend for Helpers--Production Workers

Trend for Textile Cutting Machine Setters, Operators, and Tenders



Data from [Indeed](http://Indeed.com)

### Recommended Programs

Industrial Machinery Main. and Repairer

Industrial Mechanics and Maintenance Technology. A program that prepares individuals to apply technical knowledge and skills to repair and maintain industrial machinery and equipment such as cranes, pumps, engines and motors, pneumatic tools, conveyor systems, production machinery, marine deck machinery, and steam propulsion, refinery, and pipeline-distribution systems.

Institution	Address	City	URL
Kennebec Valley Community College	92 Western Ave	Fairfield	<a href="http://www.kvcc.me.edu">www.kvcc.me.edu</a>

### Maine Statewide Promotion Opportunities for Helpers--Production Workers

O*NET Code	Title	Grand TORQ	Job Zone	Employment	Median Wage	Difference	Growth	Annual Job Openings
51-9198.00	Helpers--Production Workers	100	1	1,490	\$22,260.00	\$0.00	-10%	37



51-6031.00	Sewing Machine Operators	83	1	1,080	\$22,440.00	\$180.00	-8%	10
51-6063.00	Textile Knitting and Weaving Machine Setters, Operators, and Tenders	83	3	0	\$23,830.00	\$1,570.00	0%	0
51-2021.00	Coil Winders, Tapers, and Finishers	83	2	90	\$31,910.00	\$9,650.00	-53%	1
43-5053.00	Postal Service Mail Sorters, Processors, and Processing Machine Operators	80	2	970	\$41,950.00	\$19,690.00	-12%	10
43-9051.00	Mail Clerks and Mail Machine Operators, Except Postal Service	80	1	490	\$23,250.00	\$990.00	-19%	13
51-4121.06	Welders, Cutters, and Welder Fitters	80	2	1,610	\$38,030.00	\$15,770.00	7%	49
51-7021.00	Furniture Finishers	80	2	70	\$28,550.00	\$6,290.00	-31%	2
51-6041.00	Shoe and Leather Workers and Repairers	80	2	90	\$25,030.00	\$2,770.00	-19%	3
51-6062.00	Textile Cutting Machine Setters, Operators, and Tenders	80	3	110	\$24,860.00	\$2,600.00	-13%	4
51-2092.00	Team Assemblers	80	2	3,850	\$23,730.00	\$1,470.00	-7%	82
51-4121.07	Solderers and Brazers	79	2	1,610	\$38,030.00	\$15,770.00	7%	49
51-9195.07	Molding and Casting Workers	79	2	0	\$26,980.00	\$4,720.00	7%	20
51-3092.00	Food Batchmakers	78	2	640	\$25,410.00	\$3,150.00	-7%	14
51-7042.00	Woodworking Machine Setters, Operators, and Tenders, Except Sawing	78	2	900	\$23,040.00	\$780.00	-12%	23

**Top Industries for Textile Cutting Machine Setters, Operators, and Tenders**

Industry	NAICS	% in Industry	Employment	Projected Employment	% Change
Cut and sew apparel manufacturing	315200	27.94%	5,222	2,205	-57.77%
Textile furnishings mills	314100	9.79%	1,829	1,657	-9.40%
Other textile product mills	314900	9.59%	1,792	1,610	-10.18%
Household and institutional furniture manufacturing	337120	9.27%	1,732	1,318	-23.91%
Fabric mills	313200	8.18%	1,528	1,079	-29.38%



Textile and fabric finishing and fabric coating mills	313300	4.31%	806	497	-38.33%
Apparel accessories and other apparel manufacturing	315900	3.33%	623	435	-30.10%
Fiber, yarn, and thread mills	313100	3.21%	600	505	-15.78%
Other furniture related product manufacturing	337900	2.62%	490	511	4.40%
Apparel knitting mills	315100	2.27%	424	265	-37.50%
Apparel, piece goods, and notions merchant wholesalers	424300	1.88%	351	358	1.97%
Motor vehicle parts manufacturing	336300	1.21%	225	179	-20.39%
Management of companies and enterprises	551100	1.14%	212	245	15.28%
Furniture and home furnishing merchant wholesalers	423200	1.06%	197	217	9.75%
Electronic shopping and mail-order houses	454100	1.04%	194	243	25.08%

Top Industries for Helpers--Production Workers					
Industry	NAICS	% in Industry	Employment	Projected Employment	% Change
Employment services	561300	22.19%	120,164	142,842	18.87%
Animal slaughtering and processing	311600	5.61%	30,385	36,112	18.85%
Printing and related support activities	323100	4.49%	24,300	19,253	-20.77%
Converted paper product manufacturing	322200	3.76%	20,372	17,096	-16.08%
Plastics product manufacturing	326100	3.35%	18,157	19,247	6.00%
Bakeries and tortilla manufacturing	311800	2.61%	14,121	14,424	2.15%
Architectural and structural metals manufacturing	332300	2.49%	13,499	14,418	6.80%
Other wood product manufacturing	321900	2.45%	13,261	12,496	-5.77%
Fruit and vegetable preserving and specialty food manufacturing	311400	1.83%	9,936	9,009	-9.33%
Motor vehicle parts manufacturing	336300	1.77%	9,606	7,648	-20.39%
Coating, engraving, heat treating, and allied activities	332800	1.68%	9,101	7,459	-18.03%
Household and institutional furniture manufacturing	337120	1.32%	7,166	5,452	-23.91%
Machine shops	332710	1.30%	7,021	5,808	-17.28%
Cement and concrete product manufacturing	327300	1.17%	6,321	6,861	8.55%
Other fabricated metal product manufacturing	332900	1.15%	6,215	5,507	-11.39%