General Mechanical Safety Training Quiz (M_001)

	ROCHESTER MELION Ever Bett		General Mechar Quiz (M_001)	ical Safety Training
Nar	ne (print):	_]	Date:	Score:
Sigi	nature:			
	a question is worth 1 point unless otherwise noted. A part of the completed quiz to Karen Kiselycznyk (kkis@ll		-	-
1)	What is the primary cause of accidents?a) Failure to follow proceduresb) Equipment failure		People Hurrying	
2)	 If an activity seems unsafe a) Address the concern after the job is done b) The system must be safe since it is at LLE c) I just haven't been trained yet d) Stop work and address the concern 			
3)	The best way to prevent an accident is to be aware of a) True		surroundings. False	
4)	Only perform activities for which you are qualified. a) True	b)	False	
5)	Only use items in the manner for which they were intera) True		d. False	
6)	 Additional training is required for a) Cryogenic liquids b) Gas systems in excess of 150 psig c) Rigging loads in excess of 120 lbs. d) Overhead crane operation 	f) g)	Overhead hoist of Aerial (Manlift) of Fall Protection Pl All of the above	operation
7)	The first person you should ask about required PPE isa) your supervisorb) a work area supervisor	c) d)	another trained of a safety officer	perator
8)	The cleaning and care of PPE is the responsibility ofa) your supervisorb) a work area supervisor		the employee safety officers	

9) Broken or dysfunctional PPE that is provided in a wa) your supervisor	c)	the employee
b) the work area supervisor	d)	safety officers
10) PPE (safety glasses, laser glasses, hard hats, face sh should remain in the work area.	ields, e	etc.) that is provided in a work area
a) True	b)	False
1) When are safety glasses required in a laboratory?		
a) always	c)	never
b) sometimes	d)	only when posted
2) When are hardhats required?		
a) always	c)	never
b) sometimes	d)	when someone is working overhead
13) All mechanical equipment modifications must be co	ordina	ted through which group?
a) EE		ASME
b) ME	d)	O&M
4) What is the common metric for evaluating the risk l	evel as	sociated with equipment and systems?
a) Kinetic energy	,	Entropy
b) Momentum	d)	Stored energy
(5) Low pressure systems that use "house" air or nitroge for <150 psi and when used in accordance with man Safety Training.		
a) True	b)	False
6) Compressed air for general shop or laboratory use sing using restricting nozzles.	hall be	limited to a maximum pressure of 30
a) True	b)	False
17) It is acceptable to use compressed air to clean clothi	ng whi	ile it is being worn.
a) True	0	False
(8) Oxygen can be used as a substitute for compressed a	air.	
a) True		False
19) All gas systems must be inspected		
a) by EE	c)	by ME after initial pressure check
b) by ME prior to operation		by ASME prior to operation
20) All gas system operators must		
a) have compressed gas system training		
b) receive training for the equipment they will open		
c) use operating procedures for systems with gas se		over 3000 psi
d) receive extra training for flammable gas systems	5	
e) All of the above		
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- 21) Vacuum systems with a volume greater than 0.4m³ need to be analyzed by ME prior to operation.a) Trueb) False
- 22) Prior to deployment, all commercial/custom pressure and vacuum vessels must be
 - a) tested by an outside laboratory
 - b) qualified by ME before initial pressure check
 - c) qualified by ME after initial pressure check
 - d) have a "U" stamp per ASME Section 8 Div. 1

23) Mechanical joints can be modified

- a) when necessary
- b) only with the review and permission of ME
- c) after inspection by the ME safety officer
- d) when approved by the Chief Safety officer

24) Which fastener substitution is acceptable

- a) A grade 8 may be substituted for a grade 5
- b) A grade 5 may be substituted for a grade 8
- c) A grade 8 may be substituted for a grade 1
- d) None until reviewed and approved by ME

25) All fasteners of the same color perform equally.

a) True
b) False
26) Bolts/screws can be over-tightened.
a) True
b) False

27) Do not over-tighten bolts.

- a) True b) False
- 28) The torque that a bolt/screw is tightened to is unimportant to the performance of a bolted joint.a) Trueb) False
- 29) All materials used in the OMEGA and OMEGA EP systems are subject to the approval of ME.a) Trueb) False
- 30) When overhead crane operations are taking place personnel not involved with the operations must
 - a) Stay clearb) Stand next to the crane operatorc) Stand underneath the payloadd) Leave the room
- 31) At LLE training is required to use any hoist for overhead lifting
 - a) True b) False
- 32) Individuals may operate cranes without specialized training if the load is less than;
 - a) 120 lbsb) 500 lbscranes may never be operated by persons who have not received
 - c) 20000 lbs specialized training.

33) Basic rigging training is required starting at a payload weight of

a)	0 lbs	c)	500 lbs
b)	120 lbs	d)	20000 lbs

34) Advanced rigging training is required starting at a payload weight of

- a) 0 lbs c) 500 lbs
- b) 120 lbs d) 20000 lbs
- 35) Rigging equipment does not need to be inspected prior to every use. a) True b) False
- 36) When moving an object that feels heavy or unwieldy, stop and get help.
 - a) True b) False
- 37) When using a ladder which statement is false
 - a) Inspect prior to use
 - b) Do not exceed the manufacturer's rated capacity
 - c) Do not allow personnel to work or pass under the ladder
 - d) Keep your weight centered over the ladder
 - e) Do not go above the highest labeled step and use only on a level non-skid surface
 - f) Secure ladder in designated locations when not in use
 - g) Face the ladder when moving up or down
 - h) Use at least two hands to grasp the ladder when climbing
 - i) Do not carry objects (loads) that could cause loss of balance and falling
 - i) Use ladders equipped with nonconductive side rails if the worker or the ladder could contact exposed energized electrical equipment

b) False

38) Ladders, rolling stairs, and manlifts must be used in accordance to manufacturers' recommendations.

- a) True
- 39) Use of manlifts is restricted to qualified operators.

a) True b) False

- 40) Housekeeping is only the responsibility of the janitorial staff. a) True b) False
- 41) All items over 4' off of the ground must be properly stored or secured to prevent becoming a falling object. b) False
 - a) True
- 42) Cable management in the Omega and Omega EP facilities must be engineered and documented. a) True b) False
- 43) Which group is responsible for the engineering and documentation of cable management?
 - c) O&M a) EE d) XOPS b) ME

44) Which group is responsible for cable engineering and documentation?

- a) EEc) O&Mb) MEd) XOPS
- 45) Modification of any equipment cannot be performed unless reviewed by
 - a) EE c) O&M
 - b) ME d) All applicable engineering groups

46) Use of hand tools is permitted under which circumstances.

- a) used in accordance to manufacturers' recommendations
- b) use is reviewed with a qualified user
- c) shown how to use it by a machinist
- d) any of the above
- 47) Training for the use of Student Machine Shop is required.
 - a) True b) False
- 48) Use of Student Machine Shop is a privilege and not a right.a) Trueb) False
- 49) A qualified user of the Student Machine Shop is automatically qualified to use equipment in the LLE Machine Shop.
 - a) True b) False
- 50) Qualified users for the LLE Machine Shop must first check in with;
 - a) only the shop supervisor
 - b) the shop supervisor or his designee
 - c) the shop supervisor after setting up your work
 - d) another qualified user