

# TO THE POINT ABOUT THE SAFE USE AND OPERATION OF ORDER SELECTORS

**LENGTH: 16 MINUTES**

**PRODUCTION YEAR: 2022**

## **PROGRAM SYNOPSIS:**

Our workplace is full of hazards, hazards that can hurt us or kill us. Controlling these hazards and preventing injuries is the point of our safety and health program. One such hazard is the one presented by the unsafe use and operation of order selectors, sometimes called order pickers. Ensuring that operators use order selectors in a safe manner can prevent injuries and save lives. That is the point of our facility's policies regarding the safe operation of order selectors. And that is the point of this program. So, pay close attention as we get "to the point" about the safe use and operation of order selectors.

## **PROGRAM OBJECTIVES:**

After watching the program, the participant should be able to explain the following:

- The features of order selectors;
- How to properly drive an order selector;
- The stability of order selectors;
- Proper safe operating practices;
- Proper retrieving of items;
- Safe lifting techniques.

## **INSTRUCTIONAL CONTENT:**

### **INTRODUCTION**

- Falling objects, lifting and manual handling, the risk of falling, and operator inattention are all potential causes of property damage, injuries, and fatalities related to the use and operation of order selectors.
- Order selectors are considered by OSHA to be a type of Powered Industrial Truck. As part of our organization's Powered Industrial Truck training program, operators of order selectors must receive specific "hands-on" training on the type of order selector they will be authorized to operate.

### **ORDER SELECTOR FEATURES**

- Only those employees who are trained and authorized may operate an order selector. Let's now discuss some of the common features that are found on a typical order selector.
- First, there is the operator's platform and control panel. This area contains the vehicle's operating controls and also provides some protections to the operator.
- The operator's platform is covered by an overhead guard that provides protection from overhead hazards and falling objects.
- The overhead guard also includes a connection point designed by the manufacturer to accommodate a lanyard as part of a personal fall arrest system for the operator.
- There are two important controls located on or near the floor of the operator's platform.
- First is the service brake pedal, also known as the "dead man's switch," which must remain depressed for the order selector to operate. When released, the brakes are activated, and the order selector will come to a stop.
- Next is the pallet clamp pedal. Any time a pallet or other approved platform is seated against the backstop, a pallet clamp is used to grasp the center support of the pallet or platform to provide stability and security.
- The control handle of an order selector controls the direction of travel and speed of the order selector.
- Moving the control handle towards the forward position causes the vehicle to move forward.
- Moving the control handle in the reverse direction causes the vehicle to move backwards.

- To slow the movement of the order selector more quickly, the control handle may be moved through the neutral position and directly into the opposite direction to bring the vehicle to a controlled stop. This stopping technique is known as “plugging.” It takes practice to perfect.
- Of course, releasing the dead man’s switch will also bring the vehicle to a complete stop in an emergency.
- Located near the control handle will be the controls to raise and lower the forks and operator’s platform. This entire assembly travels up and down as one unit.
- The steering wheel is also located on the control panel and controls the turning of the vehicle.

### **DRIVING AN ORDER SELECTOR**

- Becoming proficient in the operation of an order selector takes practice, and an operator must demonstrate their proficiency as part of the certification process to be an authorized operator.
- Driving an order selector is unlike driving an automobile. It’s important for operators to understand their unique steering and handling characteristics.
- When driving forward, the drive wheel is in front, and the forks are trailing.
- When driving in this configuration, the order selector tends to “cut the corner” when turning, and an inattentive operator may collide with objects or pedestrians.
- When traveling forward, swing wide while turning and always turn slowly and cautiously.
- When driving in reverse, the drive wheel is in the rear and the forks are leading. When driving in this configuration, the drive wheel and the vehicle’s counterweight will swing wide while turning. This wide swinging movement requires extra caution to avoid collisions when turning near objects or pedestrians.
- Order selectors are very heavy due to the counterweight that is required to offset the weight of an elevated load.
- They require more stopping distance than an automobile and do not change travel directions instantly. This is why operators of these powerful industrial trucks must make it a point to always remain focused on safe use and operation.
- Always sound the horn and look around for pedestrians or other hazards prior to moving the order selector.
- Proceed slowly and cautiously, especially in tight quarters.
- Stand close to the control panel before moving the vehicle and keep a firm grip to help keep your balance when underway. Some operators also lean into the control panel with their body to add even more stability.
- When traveling about the facility, travel with the forks low and trailing.
- Keep all body parts inside the protective area of the operator’s platform at all times while traveling.
- Come to a complete stop at all intersections or blind corners. Sound the horn and look carefully for oncoming traffic or pedestrians.
- Take advantage of any mirrors or similar devices to help your view.
- Yield the right of way to any pedestrians you encounter and make sure all pedestrians are well clear of the order selector before raising or lowering the platform or moving in any direction.
- Do not allow pedestrians to come near the order selector while the platform is elevated.
- Never drive the order selector towards a person who is standing in front of a solid object or wall, and never allow anyone to ride on the vehicle or pallet.

### **ORDER SELECTOR STABILITY**

- Now let’s talk about some of the factors that affect an order selector’s stability.
- A qualified operator of an order selector must be able to use the vehicle’s data plate to determine its maximum lifting capacity for a specified load center. The load center is the distance from the backstop to the center of gravity of the load.
- For example, a standard North American pallet of 48-inch length has a 24-inch (600mm) load center when loaded in a balanced manner and seated against the backstop. The order selector’s data plate will list its maximum lifting capacity for a 24-inch (600mm) load center.

- When loading the pallet, work from the outside in, starting with the lightest items to be picked. The heaviest items should be placed near the operator's platform to maximize stability.
- The stability of an order selector is also impacted by the height to which the platform is raised. As the platform and load are elevated, a longer lever arm is being created and the order selector becomes more top-heavy and less stable. Because of this, the vehicle's data plate will specify the maximum lifting capacity at various lifting heights.
- The stability of an order selector is also impacted by its movements, and when an order selector is moving while elevated, it is at the greatest risk of a tip-over.
- To maximize stability, an order selector should come to a complete stop before raising or lowering the platform, and best practice is to fully lower the platform before traveling.
- An elevated order selector should never be turned while underway; it should always be lowered before turning.
- When engaged in order picking operations with the platform elevated to 152 inches or less, which is just over 12 ½ feet or 3 ½ meters, it is generally accepted that traveling in a straight line is permitted.
- When doing so, travel only in a straight line at a slow rate of speed and stay alert for any obstacles or obstructions.
- However, be sure to check the operator's manual for any operating limitations while elevated. Always follow the safety recommendations of the equipment's manufacturer.
- When order picking operations require the platform to be elevated above 12 ½ feet or 3 ½ meters, it should not travel while elevated unless it is wire guided, it is confined inside safety rails, or the operator has engaged a constant pressure inching button.

## **SAFE OPERATING PRACTICES**

- Let's now discuss safe operating practices related to order selectors. Safe operation begins with a preoperational inspection before the vehicle's first use of the day or shift.
- Be sure to follow the inspection checklist provide by the manufacturer or one provided by your organization. Most inspections will include the following items.
- First, walk around the vehicle and look for any major damage or defect. Inspect each fork. Each should be secure, and not bent, cracked, or excessively worn. The lift chains should also be visually inspected for damage.
- Look at each wheel and ensure each is in good condition. Also, look under and around the vehicle for hydraulic leaks.
- Turn on the unit and test the control display, flashing lights, and horn, and ensure the battery is fully charged. Also test the E-stop if one exists.
- Next, all hydraulic controls and drive functions should be tested.
- Begin by inspecting each component of your personal fall protection system, then don the body harness and connect the lanyard to the connection point on the overhead guard.
- Deploy the guardrails and ensure that the vehicle will not operate unless the guardrails are in place.
- In an uncongested area, drive the truck slowly in both directions and test the braking distance and the plugging distance. Start at a slow speed and gradually increase to full speed in each direction. If the braking or plugging distance seems too long to stop safely, do not operate the vehicle.
- Ensure the steering is smooth and working properly.
- After checking for overhead obstructions, raise the platform, and then lower it again.
- Once all inspection items are verified to be working correctly and the inspection checklist properly completed, the order selector may be put into service.
- Prior to beginning order picking operations, inspect the aisle where you intend to work and clear any debris or obstacles. Even a small item can suddenly stop the machine and cause you or the load to tumble.
- When mounting the platform, make sure you have a firm handhold before stepping up, and immediately connect the lanyard of your fall protection to the connection point overhead.

- Don any additional PPE that may be required by your organization.
- To pick up a pallet or specialized platform, first inspect the pallet or platform to ensure it is in good condition. This is especially important if you intend to stand on it later while picking orders.
- Then, back into the pallet or platform until it is flush with the order selector's backstop to securely lock the pallet onto the order selector.
- Transport the order selector to the appropriate working area and come to a complete stop before raising the platform.
- Watch out for any overhead obstructions such as lights, conduit or sprinklers as the platform is raised.

### **SAFE LIFTING TECHNIQUES**

- It is important for an order selector operator to practice good lifting and manual handling techniques to avoid injury.
- Position the lift close to the rack so items may be obtained without overreaching. You may lift the side rail to retrieve items more easily.
- Bring the item close to your body, near waist level before lifting.
- When it is necessary to step onto a pallet or other platform designed for this purpose, stay near the middle, in between the supporting forks. When stepping, make sure your feet are placed solidly on a board and not into the space between boards. Never step on or near the edge of a pallet.
- Once lifted, do not twist your back as you maneuver the item. Use your feet to turn your body as one unit rather than twisting.
- To place the item, keep the load close to your body and lower it by bending your knees while keeping your shoulders back and your head up. This minimizes the strain on your lower back.
- Always avoid bending at the waist with straight knees. This unsafe posture leads to many back injuries each year.
- Also avoid repeatedly reaching overhead. This can cause excessive wear on the soft tissues of the shoulder.
- Use an assist tool to pull items closer to you if needed, but do not step out onto the racks.
- Do not apply excessive side load forces while attempting to manipulate materials. Excessive side loading can cause a tip-over.
- If it is not possible to safely reach an item, the pallet will need to be removed from the rack and brought down to floor level to retrieve the item safely.
- When your work is completed, make it a point to return the order selector to its proper storage location. Park the order selector in its designated location when your work is completed. Lower the forks fully, turn off the vehicle, and remove the key if required by your organization.
- If you have been trained to do so, connect the charger to ensure the order selector is fully charged for its next use.

### **CONCLUSION**

- As an operator of an order selector, keeping you and your co-workers safe while maneuvering the vehicle and picking orders must be your number one priority.
- In this program, we have discussed the handling and stability characteristics of order selectors and learned how to prevent tip-overs. We also pointed out the safe work practices that must be followed to prevent injuries and fatalities.
- After all, preventing injuries is the point of our safety and health program, which is why you must make it a point to be safe.

## To The Point About The Safe Use and Operation of Order Selectors

### ANSWERS TO THE REVIEW QUIZ

1. a
2. a
3. b
4. a
5. a
6. a
7. b
8. b
9. a
10. a

**To The Point About The Safe Use and Operation of Order Selectors**  
**REVIEW QUIZ**

Name \_\_\_\_\_ Date \_\_\_\_\_

*The following questions are provided to determine how well you understand the information presented in this program.*

1. The operator's platform is covered by an overhead guard that provides protection from overhead hazards and falling objects.
  - a. True
  - b. False
  
2. The service brake pedal, also known as the "dead man's switch," must remain depressed for the order selector to operate.
  - a. True
  - b. False
  
3. Driving an order selector is just like driving an automobile. The steering and handling characteristics are the same.
  - a. True
  - b. False
  
4. When driving in reverse, the drive wheel is in the rear and the forks are leading and will swing wide while turning. This wide swinging movement requires extra caution to avoid collisions when turning near objects or pedestrians.
  - a. True
  - b. False
  
5. Always sound the horn and look around for pedestrians or other hazards prior to moving the order selector.
  - a. True
  - b. False
  
6. To maximize stability, an order selector should come to a complete stop before raising or lowering the platform, and best practice is to fully lower the platform before traveling.
  - a. True
  - b. False
  
7. If an item on the inspection checklist is not working correctly, make a mental note of it and then report it after your shift.
  - a. True
  - b. False
  
8. If it is not possible to safely reach an item, step out onto the racks to get it.
  - a. True
  - b. False
  
9. When loading the pallet, work from the outside in, starting with the lightest items to be picked. The heaviest items should be placed near the operator's platform to maximize stability.
  - a. True
  - b. False
  
10. Position the lift close to the rack so items may be obtained without overreaching. Bring the item close to your body, near waist level before lifting.
  - a. True
  - b. False