

# ENTERTAINMENT: BACKS AND LIFTING

## INTRODUCTION

From scenery and props, lighting and sound equipment, costumes and wardrobe racks, to broadcasting and camera equipment, there are a variety of different materials that are lifted or picked up within the entertainment industry. And due to the weight and size differences of all of these objects, there is the potential for individuals to cause serious injuries to their backs if certain precautions are not practiced. In this lesson, we will cover injuries that may occur from using improper lifting techniques, personal protective equipment that may be used when lifting equipment, and lifting safety tips.



### INJURIES THAT MAY OCCUR FROM USING IMPROPER LIFTING TECHNIQUES

There are many different types of injuries that may occur when you perform a lift improperly. This includes, but may not be limited to:

- Musculoskeletal injuries, such as:
  - Sprains
  - o Strains
  - Herniated or slipped discs
  - Sciatica (i.e., pressure being placed on your sciatic nerve)
- Repetitive stress injuries (RSIs), such as
  - Tendinitis (i.e., inflammation of a tendon)
  - Bursitis (i.e., inflammation of the bursa, a fluid-filled sac that reduces friction)
- Fractures
- Cuts and abrasions
- Compression injuries
- Chronic pain
- Internal injuries, such as:
  - Hernias
- Circulatory system injuries, such as:
  - Varicose veins
    - This is where pressure is increased inside of the veins, which weakens the walls of the veins and causes them to become enlarged.

## PERSONAL PROTECTIVE EQUIPMENT

One way that individuals can minimize their chances of an injury occurring is to wear the appropriate personal protective equipment (PPE) for the lift. PPE may include:

- Gloves
- Non-slip or steel-toed shoes

You should inspect all provided PPE before you put it on. Report worn or damaged items to your supervisor. Do NOT wear damaged PPE.







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#### **LIFTING TIPS**

In addition to wearing the appropriate PPE, you can also use the following tips when performing lifts while on the production:

# **Warming Up**

Just as with other physical activities, it is recommended that you warm your muscles up before performing a manual lift by stretching. You should speak with your medical provider about a stretching routine that will work for you before performing stretches within the workplace.

For more information on stretches, please refer to our series of full body stretches, including, "Full Body Stretches: Arms and Shoulders," "Full Body Stretches: Back and Wasit," "Full Body Stretches: Hands and Wrists," and "Full Body Stretches: Legs."

### **Pre-Lift Assessments**

Before you perform a lift, you should conduct a pre-lift assessment of the object or objects that you will lifting. When performing an assessment, you should take a look at the following:

- Assess or test the weight of the object
- Consider the shape of the object
- Inspect the path of travel for obstacles, debris, or other hazardous conditions

For objects that weigh 50 pounds or more or objects that are awkwardly shaped, you should either perform a team lift or use a mechanical lifting device.

If there are obstacles, debris, or other hazardous objects in your path of travel, and it is feasible, you should remove the hazards before performing the lift. If you cannot remove hazards from your path of travel, report the conditions to your supervisor.

# **Breaking Up Loads**

Where it is feasible, you should break larger loads into smaller ones, even if it may mean a few more trips. Trying to lift a larger load could make it heavy, which can increase your chances of an injury occurring.

## **Proper Lifting Techniques**

When you are ready to perform a manual lift, you should practice proper lifting techniques. Proper lifting techniques include:

- Making sure that you are close to the load as possible so that you are centered over it with your feet shoulder-width apart.
- Making sure that your knees are bent in a squat position while your back is straight.
- Assuring that you have a firm grip on the object by using both your hands.
- Performing a slow lift by keeping the load close to your body while straightening your legs into a standing position.
- Making sure that you are not twisting while lifting the object.
  - If you have to change direction, move your feet in the direction that you want to move instead
    of twisting your body.





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## **Mechanical Lifting Devices**

If an object is too heavy or awkward for you to safely lift on your own, consider using a mechanical lifting device. Mechanical aids can include, but may not be limited to:

- Dollies
- Carts
- Forklifts
- Cranes
- Other lifting equipment

Use all mechanical lifting devices in accordance with the manufacturer's instructions and your company's policies and procedures. If you have questions about a certain lifting device, please speak with your supervisor.

Please note that for forklifts, only certified drivers should operate the forklifts.

## **Team Lifts**

If a mechanical lifting device is unavailable or an object is too heavy or awkward to lift by yourself, it is recommended that you use a team lift. When performing a team lift, you should do the following:

- Where feasible, ask for assistance from individuals who are around the same height as yourself.
- Practice good communication by discussing how the lift will work, your path of travel, who will be giving directions, and so on.
- Make sure that everyone has come to an agreement on who will be leading the lift and giving commands.
- Where feasible, assure that the load is kept at the same height during the lift.

#### **Actors and Lifting**

Just as with those behind the scenes, there will be times when actors may be asked to lift props for a certain scene. To help minimize the chances of an accident occurring when lifting props, actors should do the following:

- Make sure that you understand the choreographed movements for the scene.
  - If you have questions about a certain choreography, please speak with the designated choreographer for the scene.
- Assure that choreographed lifts have been regularly rehearsed and that you are comfortable with both the prop and the lift that you are being asked to perform.
- Make sure that your body has been properly warmed up for the movement that you will be performing.

## CONCLUSION

To conclude, many individuals will be asked to lift different objects while behind the scenes and on set. To help minimize the chances of an injury or accident occurring, both behind the scenes and on set staff should perform medically approved stretches before lifting and be comfortable with the size and weight of the object to be lifted. In some cases, either team lifts or mechanical lifting device should be used in place of the individual trying to perform a solo lift. Additionally, larger loads should be broken down into smaller loads where feasible. If you have questions about lifting on your production, please speak with your supervisor or designated staff member.

