

Report On the Matter of
(Plaintiff)

Vs

**Disney Theatrical Productions Ltd d/b/a Disney Theatrical
Group, et al. (Defendants)**

Prepared by
Theatre Safety Programs

Attachments: A – Materials Reviewed
B – Resume of

The opinions contained herein are the opinions of _____ on the incident outside the Hippodrome Theatre; Baltimore, Maryland; _____. These opinions are based on the review of documents listed in Attachment A, research, and his training and experience in the area of entertainment industry safety, theatrical touring, theatrical operations and venue management.

After reviewing the drawings and photographs presented of the deck cart in question, the street outside the theatre where the trucks were being loaded and the security video of the incident, it is my opinion, based on my years of experience in handling carts, observing the use of carts, and designing carts for the transport of theatrical equipment and materials, that the deck cart in question designed and built for the transport of deck units for the _____ tour was unstable, even under optimal conditions. This opinion is supported by the tip over incident that occurred at the _____ shops on

1

Unfortunately, nothing about loading and unloading conditions for touring shows is ever free of potential problems and hazards. Some of these issues are simply annoying, some are just difficult, (such as the theatre up three flight of stairs in a school in Detroit), and others pose potential hazards to the crews handling the equipment, scenery and materials. Weather and lighting conditions may also impact safe operations. Any or all of these issues may be present at a particular time and location.

Even equipment frequently used to unload and unload a truck can be a problem. The transition from the truck floor to an unloading ramp can be a problem because the transitions are often not smooth. The transition from the unloading ramp to the ground is often not particularly smooth.

Frequently, shows must be loaded and unloaded in/on parking lots, streets and sidewalks for a variety of reasons. These reasons include an insufficient number of loading docks, no loading dock and touring trucks that cannot back up to or otherwise access existing loading docks.

The variety of conditions dictates that road boxes, equipment carts and large scenic elements must be designed to be moved over a wide variety of surface conditions. In some locations, the maintenance of the street surfaces may present an issue. There can be potholes and patches that are not even with the existing surface. There are often utility access covers with uneven surfaces and various grates for drainage and other purposes.

Many streets have a "crown" with the center being higher than the side so water will run to the sides and into the storm drain holes placed at the curb. The crown results in a sloping surface. Road boxes and other equipment transport boxes and carts tend to want to move "downhill" towards the curb and even towards the storm drain openings depending on exactly how the street is graded.

In this particular case, the photographs reviewed indicate a street in very poor condition with potholes, patches, cracks, a utility access cover and uneven surfaces. In addition the curb area transition from the sidewalk area leading from the theatre loading doors to the street was not particularly smooth.

Loading a cart with the base dimensions of the one in question on or off a truck with a fork lift, something that is frequently done, especially with heavier items, would, in my opinion, be problematic. Carts with these base dimensions must be securely fastened and closely monitored while being loaded.

Even on the stage, there can be elevation variations between surfaces such as the wood floor of the stage and concrete areas in the wings. Move-outs tend to result in the presence of various debris on the floor. This debris can include nails, dropped bolts and nuts of various sizes, electrical cables and general trash.

In my experience, the fact that scenery and equipment needs to be moved over a variety of surfaces is well known in the entertainment industry.²

The defendants were aware of the potential instability of the cart in question because of the tipping incident that happened at the _____ scene shop and the statements contained in the deposition of _____ 3-4

The _____ deposition mentions having to give the local crew the particular instructions necessary to move specific boxes and equipment.⁴ The surveillance video (time stamp 8:04 -08:10) shows only one person moving the cart in question. Video at time stamp 14:10-14:16 shows only two people arriving to make the move that leads to the incident in question. This video makes one wonder how thorough supervisory oversight was for this deck cart, a cart that was known to be subject to tipping.

A warning label was placed on the deck cart in question by _____. In my opinion the label is deficient in several ways.

- ❖ The label does not follow the format prescribed by ANSI Z535 Series standards on safety signs and labels.
- ❖ More importantly, while the label warns of a tipping hazard, the label only gives notice that four people are required to load and unload the cart and makes no mention that four people are required to move the cart.
- ❖ The label is not located in the best position to be seen by a person walking up to move the cart.

In the absence of a warning about moving the deck cart in question, it is entirely possible that a person about to move the deck cart in question would assume that once the cart was loaded and balanced⁵, no tipping hazard was present, and there was no minimum number of personnel required for safely moving the cart.

In my opinion, this cart was not designed and constructed, given the size, shape, and weight of the floor units and the orientation of the floor units on the cart, to consistently operate safely given the varying conditions that are met while loading and unload touring shows.

It is my opinion that this cart should not have been loaded or unloaded on a street or transported across a sidewalk, street or similar uneven surface.

It is my opinion that the warning sign was inadequate to warn of the hazard of this cart tipping while cart is being moved.

It is my opinion, that at the time of the incident at the _____ shop, it would have been a relative simple matter to modify this cart to be reasonably stable under the conditions expected to be encountered by touring shows.

This is an initial report based on the materials received to date.

NOTES:

1. Deposition of [redacted] : page 76, lines 8 – 26; page 77, lines 2-25;
page 78, lines 2-17
2. Deposition of [redacted] : page 112, lines 14-21; page 113, lines
1-8
3. Deposition of [redacted] : page 71, lines 12-21:
4. ibid, page 68, lines 12-20
5. Photograph of label on deck cart

Attachment A

MATERIALS REVIEWED

1. Photographs of theatre and area of incident and floor panel transport cart
2. Security camera video
3. Responses to request for documents, answers to Interrogatories and related documents
4. Drawings of floor panel transport cart (aka deck cart)
5. Oral Depositions of:
 - a.
 - b.
 - c.
 - d.
6. Occupational Safety and Health Standards for General Industry 29CFR1910
7. OSHA Directive CPL 02-00-124 Multi-Employer Citation Policy (1999)
8. Various entertainment industry materials standards and on safety and the use equipment materials
9. Similar incidents