



## Slips, Trips, And Pitfalls:

Employee Injuries in Senior Living Communities and How It Impacts the Bottom Line

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## Slips, Trips, And Pitfalls



**John Kiefner, CSP, ARM**  
Vice President, Risk Control  
Johnson, Kendall & Johnson



**Cullen Wise, CSP**  
Vice President, Risk Control  
Johnson, Kendall & Johnson

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## Agenda



1. **Slip, Trip, Fall Prevention**  
- Tactics for keeping employees on their feet
2. **Resident Handling**  
- A reality check as to where transfers are taking place
3. **Severity Exposure**  
- Identifying tasks with significant exposure
4. **Employee Behavior**  
- Creative ideas for auditing behavior and increasing awareness
5. **Are You OSHA Covid Compliant?**  
- Understanding OSHA's NEP & ETS on coronavirus disease

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## Slip, Trip, Fall Prevention

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## Slip, Trip, Fall Prevention

### Statistics & Considerations

- Nursing care facility workers experience more slip, trip, and fall injuries than any other industry \*
- Slips, trips, and falls account for the second largest proportion of lost-workday nonfatal injuries (26%) in nursing care facilities \*
- Nursing care facilities incident rates for same level falls and total slips, trips, and falls surpass all other industries \*
- Very little research has been done over the years on slips, trips and falls in nursing care facilities and the incident rates have remained constant

\*BLS Data



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## Slip, Trip, Fall Prevention

- Contributing Factors
- Indoor Exposure
- Outdoor Exposure
- Ladder Safety
- Employee Behavior



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## Slip, Trip, Fall Prevention

**Contributing Factors**

- **Floor Surface**

- Whenever possible, test surfaces before installed
- For slippery floor surfaces, treat with anti-slip products

| Floors Tested                         | Dry  | Wet  |
|---------------------------------------|------|------|
| Main Kitchen                          | 0.73 | 0.60 |
| Hall Outside PT                       | 0.60 | 0.45 |
| Flanagan 210 Room Tile                | 0.68 | 0.10 |
| Flanagan 210 Bathroom                 | 0.73 | 0.15 |
| Flanagan 2 <sup>nd</sup> Floor Pantry | 0.65 | 0.50 |
| Bistro / Dining                       | 0.73 | 0.53 |



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## Slip, Trip, Fall Prevention

**Contributing Factors (cont.)**

- **Floor Cleaning Process**

- Use microfiber mopping when applicable
- Use anti-slip cleaning products
- Change mop heads frequently

- **What's On The Floor**

- **The behavior or action taking place**

- **Footwear**



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## Slip, Trip, Fall Prevention

**Indoor Exposure**

- **Cords on the floor**



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## Slip, Trip, Fall Prevention

**Indoor Exposure**

- **Wet floors**
  - Kitchen
  - Freezer / Fridge
  - Bathrooms
  - Building entrances
  - Ice machines
- **Uneven surfaces**
  - Drain covers
  - Door thresholds



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## Slip, Trip, Fall Prevention

**Indoor Exposure**

- **Items on the floor**
  - Wheelchair legs
  - Doorstops
  - Wet floor signs
  - Resident room congestion
  - Fall mats
  - Lift legs & other portable devices



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## Slip, Trip, Fall Prevention

**Outdoor Exposure**

- **Winter weather**
  - Failure to clear parking lots, sidewalks, and entrances
  - Thawing and freezing of ice
  - Snow / ice between cars
  - Improper footwear



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## Slip, Trip, Fall Prevention

**Outdoor Exposure**

- **Trip hazards**
  - Parking lots
  - Walkways
  - Entrances
- **Lighting**
  - Parking lot
  - Sidewalks
  - Entrances
- **Varying types of surface**
  - Asphalt
  - Cement
  - Wood
  - Stone
  - Parking lot paint



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## Slip, Trip, Fall Prevention

**Outdoor Exposure**

- **Fall Hazards**
  - Loading docks
  - Roof access
  - Ladder use
  - Scissor lift
  - Aerial Lift



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## Slip, Trip, Fall Prevention

**Ladder Safety**

- Read ladder weight capacity
- Maintain 3 points of contact
- Only 1 person at a time may work from a single ladder.
- Belt buckle between the rails!
- Step ladder spreaders should be fully opened and locked.
- Mark off a safety zone around a ladder in a public area or area where dropped items could strike others



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## Slip, Trip, Fall Prevention

**Ladder Safety**

- The base of an extension ladder should be spaced 1 foot away for every 4 feet it reaches up.
- An extension ladder should extend 3 feet beyond the top surface the ladder is resting upon.
- Ladder side rails should be placed on a surface that is firm and level.



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## Slip, Trip, Fall Prevention



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## Slip, Trip, Fall Prevention

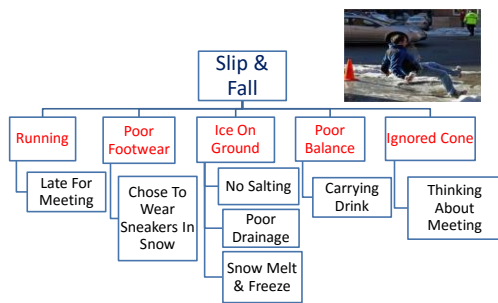


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## Slip, Trip, Fall Prevention



## Root Cause Analysis



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## Slip, Trip, Fall Prevention



## Slip Prevention (Best Practices)

- Test new floor surfaces before installing
- Modify existing floor surfaces
- Use cleaning methods with less water
- Clean with anti-slip floor products
- Use wet floor signs appropriately



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## Slip, Trip, Fall Prevention



## Slip Prevention (Best Practices)

- Develop salting and snow removal procedures for winter weather
- Use matting where appropriate
- Clean up wet areas and spills quickly
- Be aware of water run-off areas that can freeze
- Wear slip resistant footwear



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## Slip, Trip, Fall Prevention



### Trip Prevention

- Address cords in resident rooms on a daily basis
- Remove all unattached door stops
- Place wet floor signs in visible areas
- Locate all thresholds and uneven floor surfaces
- Store wheelchair legs so that they are not a trip hazard



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## Slip, Trip, Fall Prevention



### Fall Prevention

- Install railings where walking surface is more than 4 feet off the ground
- Wear fall protection harness and lanyard when above 4 feet without a railing
- Practice safe ladder usage



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## Resident Handling

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## Resident Handling



- Approx. 12% of nurses leave the profession annually because of back pain.
- 42% of nursing injuries are back related.
- Back injuries in healthcare are estimated to be \$20 billion annually.
- In 2016, nursing assistants experienced 10,330 back related musculoskeletal disorder cases.
- In 2016, 45% of all injuries to RN's involved overexertion or bodily reaction, including: bending, twisting, lifting, and repetitive motion



\*BLS Data

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## Resident Handling



### NIOSH Study | 1995-2000

- 1,728 nursing personnel followed before and after implementation of lift equipment
- WC claim rates per 100 nursing staff were reduced 61%
- OSHA recordable rates decreased by 46%
- First report of injury rates decreased by 35%
- Combative injuries were also noted to drop significantly



Items above noted in the NIOSH Science Blog found on [www.cdc.gov](http://www.cdc.gov)

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## Resident Handling – The Norm



Full Sling Lift ("Hoyer")



Sit / Stand Lift

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## Resident Handling – Difficult Transfers



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## Resident Handling – Difficult Transfers



How are we handling resident transfers in community centers and independent living?



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## Resident Handling – Difficult Transfers



Molift 150



Camel Lift

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## Resident Handling – Difficult Transfers



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## Resident Handling – Current Initiatives



- Review of resident handling injuries
- Review of written resident handling program
- Training
- Ongoing resident evaluations



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## Resident Handling – Shortcomings



- Written programs are not always realistic and are not always followed by employees
- Employee behavior and decision making "behind closed doors" does not coincide with the written program
- Improper resident assessment (initial & ongoing)



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## Resident Handling – Resident Transfer Drills

### Resident Transfer Drills!

- Audit your resident transfer program!
- Prepare for a “real life” scenario
- Assess response to the situation presented
- Identify areas for improvement from a physical and behavioral standpoint



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## Resident Handling – Resident Transfer Drills

### How To Conduct The Drill

- Decide on a scenario and stage an unoccupied room
- Ring the call bell and time the response
- Greet the staff at the door to explain the drill



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## Resident Handling – Resident Transfer Drills

### How To Conduct The Drill

- Ask staff to treat the drill as a real life scenario
- Observe decision making and actions of employees throughout the drill
- Intervene only if a staff member or the “resident” is at risk



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## Resident Handling – Resident Transfer Drills JKJ

### Items To Observe

- Was there proper communication between the employees and the “resident” throughout the drill?
- If the drill involved a fallen resident, was a pre-transfer resident assessment completed?
- Was the resident transfer conducted as indicated on the care plan?
- If the drill involved a fallen resident in a tight area, did the staff properly clear the area for the lift?



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## Resident Handling – Resident Transfer Drills JKJ

### Items To Observe

- If area was not accessible by lift, was a draw sheet or slip sheet used to get the “resident” to a lift accessible area?
- If a lift was used, was the sling positioned and attached properly?
- Are employee supporting the residents head?
- If a lift was used to transfer from the floor, were the lift legs protected with pillows or other soft items to prevent skin tears?



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## Resident Handling – Resident Transfer Drills JKJ

### Items To Observe

- If a lift is used, are the brakes left unlocked to allow the lift to continuously find the center of gravity?
- If a lift is used, are employees familiar with the lift controls and it's capabilities?
- Where manual lifting is conducted, are employees practicing proper body mechanics?



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## Resident Handling – Resident Transfer Drills

### Recap

- Explain positive observations to employees
- Explain areas that can be improved
- Open discussion



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## Severity Exposure



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## Severity Exposure – Fall From Heights

- When working above 4 feet, employees must be protected by a railing or harness and lanyard.
- When working on a flat roof, employees must wear a harness and lanyard when working within 6 feet of the edge. A warning line can be used when working within 6-15 feet from the edge.



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## Severity Exposure — Fall From Heights



- Construction standards do not require fall protection until working above 6 feet.
- Fall protection on scaffolds is not required until working above 10 feet.



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## Severity Exposure — Confined Spaces



- Confined spaces in healthcare include: manholes, utility pits, crawl spaces, etc.
- If they contain any hazard (electrical, moving parts, insufficient oxygen, etc.), they are permit required. These spaces must be properly labeled.
- It is recommend that work within these spaces be contracted out.



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## Severity Exposure - Needlesticks



- All needles must be equipped with a safety device.
- Most safety devices require an action or behavior to engage them.
- Fewer needlesticks occur with retractable technology.
- Annual review of "safe needle devices" is required by OSHA, as is a SHARPS log for all sharps incidents.



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## Severity Exposure — Machine Guarding JKJ

- Machine guarding is required where body, clothing, hair, etc. can be caught and drawn in.
- Machine guarding must be fixed or interlocked.
- Opening an interlocked guard is not a substitute for lockout/tagout.



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## Severity Exposure — Unique Exposure JKJ

- Every community has its share of unique exposures that present severe risk.
- Ask each safety committee member to bring forth one "high hazard" task from their department.
- Prioritize the list and use the Job Safety Analysis format to analyze each task.



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## Severity Exposure — Address Using JSA JKJ

JKJ JOHNSON KENDRICK JOHNSON

JOBSAFETY ANALYSIS

| Job Title                             | Department                     | Analysed by:                            | Date: |
|---------------------------------------|--------------------------------|---|-------|
| Job Environment                       |                                | Personal protective equipment required: |       |
| Lighting:                             |                                |   |       |
| Spice:                                |                                |   |       |
| Noise Levels:                         |                                |   |       |
| Temperature:                          |                                |   |       |
| Ventilation:                          |                                |   |       |
| Adjacent Activities:                  |                                |   |       |
| Basic job steps, materials, equipment | Potential accidents or hazards | Recommended procedure or protection     |       |
|                                       |                                |   |       |
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## Severity Exposure — Address Using JSA



## JOB SAFETY ANALYSIS

| Job Title: Securing Wheelchair in Van   | Department: Transportation   | Analyzed by: _____  | Date: 3/14/18 |
|---|--|---|---------------|
| Job Environment   |  | Personal protective equipment required:   |               |
| Lighting: Adequate  | Gloves, Steel Toe Shoes  |   |               |
| Space: Adequate   |  |   |               |
| Noise Level: None   |  |   |               |
| Temperature: Outside Temp   |  |   |               |
| Ventilation: N/A  |  |   |               |
| Adjacent Activities: None   |  |   |               |
| Basic job steps, materials, equipment   | Potential accidents or hazards   | Recommended procedure or protection   |               |
| 1. Ramp is extended and lowered to the ground.  | <ul style="list-style-type: none"> <li>Struck by ramp — ing container, crushed foot</li> </ul>   | <ul style="list-style-type: none"> <li>Employee was voluntarily rotating composite toe shoes, which should be mandatory.</li> </ul>   |               |
| 2. The wheelchair is pushed up the ramp into the van.   | <ul style="list-style-type: none"> <li>Shoulder back strain</li> <li>Wheel could get stuck on lip of ramp</li> </ul>   | <ul style="list-style-type: none"> <li>Store all tie-downs in a secured case</li> <li>Identify all trip hazards in the back of the van. If they can't be eliminated, train employees on the hazards.</li> </ul>               |               |
| 3. The wheelchair is positioned facing forward and the wheels are locked.                                 | <ul style="list-style-type: none"> <li>Trip and fall over tie-downs and ramp edge</li> </ul>   | <ul style="list-style-type: none"> <li>Employee was not wearing gloves, but should have been</li> <li>Check van tie-downs after securing it to ensure it is fully engaged in the floor channel</li> </ul>                     |               |
| 4. Attach 4 tie-downs into floor channels.  | <ul style="list-style-type: none"> <li>Pinched finger between tie-downs and channel</li> <li>Cut or abrasion while securing the tie-downs</li> <li>Tie-downs can come loose if not fully engaged in the floor channel</li> </ul> | <ul style="list-style-type: none"> <li>Employee was not wearing gloves, but should have been</li> <li>Check van tie-downs after securing it to ensure it is fully engaged in the floor channel</li> </ul>                     |               |
| 5. Attach 4 tie-downs to the wheelchair   | <ul style="list-style-type: none"> <li>Struck in the tie-downs could result in movement of the wheelchair</li> <li>Tie-downs hooks do not contain a safety latch, which could cause the hooks to come loose if</li> </ul>        | <ul style="list-style-type: none"> <li>After rocking the chair to eliminate slack in the straps, double check straps to ensure they are tight.</li> <li>Replace <u>Outright</u> tie-downs with the <u>Outright</u></li> </ul> |               |
| 6. Ensure all tie-downs are properly tensioned by rocking wheelchair back and forth to take up any slack. |  |   |               |

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## Employee Behavior

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## Employee Behavior



## Unsafe Behavior In Healthcare

- Resident transfer protocol not followed (sprain/strain)



- Failure to wear appropriate PPE (cuts, burns, chemical exposure, slips/falls)



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## Employee Behavior



### Unsafe Behavior In Healthcare

- Job specific safety protocol and core competencies not followed



- Rushed resident care (combativeness)



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## Employee Behavior



### Audit And Modify Behavior

- Resident transfer drills
- Job safety analysis
- Observe behavior of coworkers
- Check safety interlocks (balers, compactors, mixers, etc.)



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## Employee Behavior



### Audit And Modify Behavior

- Room of hazards



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## Employee Behavior



## Audit And Modify Behavior

- Audit required PPE



- Incorporate questions within your safety audits

❑ **Haz Com** – “Can you please locate the SDS for \_\_\_\_.”

❑ **Lockout / Tagout** – “What is LOTO and when is it used?”

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## Employee Behavior



## Audit And Modify Behavior

BE CREATIVE!



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Are You OSHA Covid Compliant?

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## OSHA National Emphasis Program (NEP) Coronavirus Disease



- On March 12<sup>th</sup>, 2021 OSHA announced the NEP on coronavirus disease
- NEP is focused on protection of high-risk workers from Covid-19
- Targeted industries include healthcare, manufacturing, warehousing, construction, and other select industries.
- The NEP will also include follow-up visits of worksites previously inspected in 2020 and 2021.



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## Respiratory Protection Plan Requirements



1. A procedure for selecting respirators for use in the workplace
2. Medical evaluations for all users of respirators
3. Initial and annual fit-testing for all users of tight-fitting respirators
4. A procedure for proper use of respiratory protection (includes user seal checks)
5. Procedures and schedules for cleaning, disinfecting, storing, inspecting, repairing, discarding, and otherwise maintaining respirators
6. Annual training for all users of respirators



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## Recent OSHA Activity In Healthcare



**OSHA Levies \$3.9M in  
COVID-19 Workplace Fines**

- 1. Respiratory Protection Program (~\$13,000 per citation)**
  - Written Program
  - Medical Clearance For N95 Use
  - Fit Testing
  - Training
  - Use Of Non-Approved KN95
- 2. Severe Injury Reporting (~\$9,000 per citation)**
  - Failure to report to OSHA following the hospitalization of an employee
  - Failure to report to OSHA following an employee fatality

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## OSHA Levies \$3.9M in COVID-19 Workplace Fines

- 3. OSHA Recordkeeping (~5,000 per citation)**
  - Failure to report incident on OSHA 300 log
- 4. Hazard Communication (~\$7,000 per citation)**
  - Lack of written program
  - Lack of safety data sheets
  - Lack of training
- 5. Personal Protective Equipment Assessment**
  - Lack of task specific PPE assessment
- 6. General Duty Clause (5A)**
  - "Must provide a safe work environment for employees"
  - Used for violence in the workplace (including combative resident injuries)
  - Used for resident handling and transfer injuries

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## Recording Covid-19 On OSHA Log

[illegible]

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## Recording Covid-19 On OSHA Log

1. The case is a confirmed case of COVID-19.
2. The case is work-related as defined by the recordkeeping standard; and
3. The case involves one or more of the general recording criteria set forth in the recordkeeping standard

[illegible]

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## OSHA Recordkeeping & Reporting Overview



### 1. Recordkeeping Requirements

- How does OSHA define a recordable injury or illness?
- How does OSHA define first aid?

### 2. Maintaining and Posting Records

- Requirements for forms 300, 300A, and 301

### 3. Electronic Submission Of Records

- Submission of 300A via ITA Launch Page

### 4. Severe Injury Reporting

- Fatality, amputation, loss of eye, in-patient hospitalization

<https://www.osha.gov/recordkeeping>

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## OSHA Emergency Temporary Standard (ETS) – Coronavirus Disease



- Covid-19 Plan to include: patient screening & management, standard and transmission-based precautions, PPE requirements, protocol for aerosol-generating procedures, physical distancing and barriers, health screening and management, and cleaning/disinfecting. Ventilation (MERV 13 filter or higher...or highest accepted by system)
- Covid-19 Log
- Reporting work related Covid-19 fatalities and in-patient hospitalization (time frames eliminated)
- Mini-respiratory protection program (wearing respirator in lieu of a facemask)
- Training / Education

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## Slips, Trips, And Pitfalls



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JKJ

JOHNSON  
KENDALL  
JOHNSON

Slips, Trips, And Pitfalls:  
Employee Injuries in Senior Living Communities and  
How It Impacts the Bottom Line

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