

### Key Points in the Certified Green Dealer™ Video Module “Mold”

#### 1. WHY MOLD MATTERS

- Mold has emerged in recent years as a significant potential problem in buildings.
- Mold can rot buildings to the point where they have to be torn down, or cause health concerns for inhabitants due to compromised indoor air quality.
- Each year the building industry spends millions of dollars in payout for mold damage, and millions more for on-site mold remediation.
- While tight houses may have sophisticated thermal systems, they don't always have great ventilation systems, or homeowners don't use the systems. That means high relative humidity inside a home, and humidity above 70% can support mold growth.
- Mold can produce mycotoxins, a poison that comes from fungi. Mycotoxins can create acute and chronic health effects for people through ingestion, skin contact, or inhalation.
- Molds also can produce volatile organic chemicals or VOCs.
- Once a person has been exposed to mold, he or she can be sensitized and in the future, it may not take as much mold, or as long an exposure, to produce adverse health symptoms.

#### 2. MOLD—WHAT IT IS AND HOW IT GROWS

- Molds are any of a collection of various fungi that live on and eat organic matter.
- Mold needs four things to grow: 1) oxygen; 2) a certain temperature range—generally 40 to 100 degrees; 3) moisture, and 4) a source of food (sugar and starches from cellulose).
- Food for mold can be paper-faced gypsum drywall, wood products, and even some carpet.
- Some mold spores can germinate in as little as 4 to 12 hours. In wet, porous materials, mold can grow very quickly in just a 24- to 48-hour period.



### 3. HOW LUMBERYARDS CAN MITIGATE MOLD

- Food for mold is everywhere in a lumberyard in the form of wood and the paper face on drywall.
- Shipping moldy wood or drywall to a jobsite might ultimately compromise the air quality for the occupants of a house; result in a lawsuit, or in worst cases, cause some part a structure to be demolished and replaced.
- To control mold in a lumberyard, the mold must be deprived of moisture. That means covering (and adequately venting) wood and drywall in your yards to keep it dry; shipping it dry; delivering it dry, and advising contractors to cover materials on site.
- Moisture to support mold can come from dew, rain, or the wood itself. (Moisture may appear on the surface of unseasoned framing lumber as it dries.)
- To defeat most molds, the moisture content of wood should to be reduced to below 20%, although surface water can promote mold as well.
- Lumber will eventually dry to below 20% moisture content on its own, but covering the wood too tightly with plastic during this time can keep moisture from evaporating.
- Wood should be stored under cover in a dry location, and monitored regularly for any condensation that may appear on the underside of its covering.
- Every lumberyard should have a mold-containment and inspection plan. Before lumber leaves your yard, inspect it for mold. A disciplined inspection process that notes the condition of wood can actually lower your liability.
- If you do find mold on your lumber, don't spray it with bleach. That may kill surface mold, but it won't kill the spores, and bleach can also be an irritant to employees performing this cleanup. (Bleach can also cause corrosion of electrical and mechanical components.)



## COURSE REVIEW

- Mold spores growing on the surface of wood should be cleaned by wet wiping or wet vacuuming the surface. The surface should also be scrubbed with water and detergent, and left to thoroughly dry before being cleaned with a HEPA vacuum.
- Workers who do any mold cleanup should be protected with NIOSH-approved respirators, gloves, and eye protection.
- If mold-free wood that you shipped develops mold later, it's likely that the mold was caused by moisture from rain, on-site groundwater, or indoor sources such as moisture from humidifiers, bathrooms and kitchens which aren't properly vented, or faulty dryer exhaust systems.
- Stage all deliveries on a just-in-time basis, so wood and drywall are delivered as needed and products do not pile up unprotected on site.
- Lumberyard professionals should serve as knowledgeable sources of information about mold to contractors to help save them time, trouble, and money. Remind contractors that building design flaws such as poorly installed housewrap or poorly executed flashing systems also contribute to mold.

#### 4. WHY MOLD MATTERS IN GREEN BUILDING

- Mold can negatively impact a great many people, as the liability for mold damage can touch the contractor, the subcontractor, and even the lumber dealer. Mold is a concern for everyone in the building industry for legal reasons.
- Indoor air quality and ultimately a building itself can be compromised by mold.
- If mold becomes pervasive, it can actually force the building to be torn down.
- There are upsell products that can reduce the chance of mold growth in structures. Paperless drywall systems use a dense, moisture-resistant gypsum core and fiberglass mats to replace paper faces on both sides of the drywall panel to frustrate mold growth. ■

