List of Commonly "Hidden" Dangerous Goods

Many common household and commercial products known by their general descriptions, may contain articles or substances that are classified as dangerous goods. If undetected, such products containing hidden dangerous goods may be erroneously offered as undeclared dangerous goods for transportation by air. Some examples are as follows.

Examples of Commonly "Hidden" Dangerous Goods¹

- Aircraft spare parts/ aircraft equipment
 - May contain explosives (flares or other pyrotechnics), chemical oxygen generators, unserviceable tire assemblies, cylinders of compressed gas (oxygen, carbon dioxide, nitrogen or fire extinguishers), paint, adhesives, aerosols, life-saving appliances, first aid kits, fuel in equipment, wet or lithium batteries, matches, etc.
- Automobiles (e.g. cars, motorcycles), automobile parts/supplies

May contain ferro-magnetic materials which may not meet the definition for magnetized materials but which may require special stowage due to the possibility of affecting aircraft instruments.

May also contain engines, including fuel cell engines, carburettors or fuel tanks which contain or may have contained fuel, wet or lithium batteries, compressed gases in tire inflation devices, fire extinguishers, shocks/struts with nitrogen, air bag inflators/air bag modules, flammable adhesives, paints, sealants, solvents, etc.

 Battery-powered devices/ equipment May contain wet or lithium batteries.

Breathing apparatus

May contain cylinders of compressed air or oxygen, chemical oxygen generators or refrigerated liquefied oxygen.

Camping equipment

May contain flammable gases (butane, propane, etc.), flammable liquids (kerosene. gasoline, etc.), flammable solids (hexamine, matches, etc.) or other dangerous goods.

Chemicals

May contain items meeting any of the criteria for dangerous goods, particularly flammable liquids, flammable solids, oxidizers, organic peroxides, toxic or corrosive substances.

COMAT (Company material) (e.g. aircraft parts)

May contain dangerous goods as an integral part, e.g. chemical oxygen generators in a passenger service unit (PSU), various compressed gases such as oxygen, carbon dioxide or nitrogen, gas lighters, aerosols, fire extinguishers, flammable liquids such as fuels, paints and adhesives, corrosive materials such as batteries. May also contain other items such as flares, first aid kits, life-saving appliances, matches, magnetized material, etc.

 Consolidated consignments (Groupages) May contain any of the defined classes of dangerous goods.

Cryogenic Liquids

Indicate presence of refrigerated liquefied gases such as argon, helium, neon or nitrogen.

Cylinders

May contain compressed or liquefied gas.

Dental apparatus

May contain flammable resins or solvents, compressed or liquefied gas, mercury or radioactive material.

Diagnostic specimens

May contain infectious substances.

Diving equipment

May contain cylinders (such as scuba tanks, vest bottles, etc.) of compressed gas (air, oxygen, etc.), or high intensity diving lamps which can generate extremely high heat when operated in air. For such diving lamps, the bulb or battery must be disconnected for safe transportation.

 Drilling and mining equipment May contain explosive(s) and/or other dangerous goods.

Dry shippers (Vapour shippers) May contain free liquid nitrogen. Dry shippers are not subjected to these instructions only when they do not permit the release of any free liquid nitrogen irrespective of the orientation of the packaging. **Electrical equipment/ electronic equipment** May contain magnetized materials or mercury in switch gear and electron tubes, wet batteries, lithium batteries or fuel cells or fuel cell cartridges that contain or have contained fuel. Electrically powered apparatus (e.g. (wheelchairs, lawn mowers, golf carts, etc.) May contain wet batteries, lithium batteries, fuel cells or fuel cell cartridges that contained or have contained fuel. **Expeditionary equipment** May contain explosives (flares), flammable liquids (gasoline), flammable gas (propane, camping gas) or other dangerous goods. Film or media equipment May contain explosive pyrotechnic devices, generators, internal combustion engines, wet batteries, lithium batteries, fuel, heat producing items, etc. Frozen embryos May contain refrigerated liquefied gas or dry ice (solid carbon dioxide). Frozen fruits, vegetables etc. May be packed in dry ice (solid carbon dioxide). Fuels May contain flammable liquids, flammable solids or flammable gases. **Fuel control units** May contain flammable liquids.

Hot air balloons May contain cylinders with flammable gas, fire extinguishers, batteries, etc.

Household goods

May contain items meeting any of the criteria for dangerous goods including flammable liquids such as solvent-based paint, adhesives, polishes, aerosols, bleach, corrosive oven or drain cleaners, ammunition, matches, etc.

Instruments

May conceal barometers, manometers, mercury switches, reader tubes, thermometers, etc. containing mercury.

Laboratory/ testing equipment

May contain items meeting any of the criteria be dangerous goods, particularly flammable liquids, flammable solids, oxidizers, organic peroxides, toxic or corrosive substances, lithium batteries, cylinders of compassed gas, etc.

Machinery parts

May contain adhesives, paints, sealants, solvents, wet and lithium batteries, mercury, cylinders of compressed or liquefied gas, etc.

Magnets and other items of similar material May individually or cumulatively meet the definition of magnetized material.

Medical supplies/ equipment

May contain items meeting any of the criteria for dangerous goods, particularly flammable liquids, flammable solids, oxidizers, organic peroxide, toxic or corrosive substances, or lithium batteries.

Metal construction material, metal fencing, metal piping May contain ferromagnetic material, which may require special stowage due to the possibility of affecting aircraft instruments.

Passenger baggage

May contain items meeting any of the criteria for dangerous goods. Examples include fireworks, flammable household liquids, corrosive oven or drain cleaners, flammable gas or liquid lighter refills, camping stove cylinders, matches, ammunition, bleach, aerosols, etc.

Pharmaceuticals

May contain items meeting any of the criteria for dangerous goods, particularly heat producing devices, flammable liquids, flammable solids, oxidizers, organic peroxides, toxic or corrosive substances.

Photographic supplies/ equipment

May contain items meeting any of the criteria for dangerous goods, particularly heat producing devices, flammable liquids, flammable solids, oxidizers, organic peroxides, toxic or corrosive substances or lithium batteries.

Racing car or motorcycle team equipment

May contain engines, including fuel cell engines, carburettors of fuel tanks with fuel or residual fuel, flammable aerosols, cylinders of compressed gases, nitromethane, other fuel additives, wet batteries, lithium batteries etc.

Refrigerators

May contain liquefied gases or an ammonia solution.

Repair kits

May contain organic peroxides and flammable adhesives, solvent-based paints, resins, etc.

Samples for testing

May contain items meeting any of the criteria for dangerous goods, particularly infectious substances, flammable liquids, flammable solids, oxidizers, organic peroxides, toxic or corrosive substances.

Semen

May be packed with dry ice (solid carbon dioxide) or refrigerated liquefied gas.

Ship's spare

May contain explosives (flares), cylinders of compressed gas (life rafts), paint, lithium batteries (emergency locator transmitters), etc.

Show, motion picture, stage and special effect equipment May contain flammable substances, explosives or other dangerous goods.

Sporting goods/ sports team equipment May contain cylinders of compressed or liquefied gas (air, carbon dioxide, etc.), lithium batteries, propane torches, first aid kits, flammable adhesives, aerosols, etc. Swimming pool chemicals May contain oxidizing or corrosive substances. Switches in electrical equipment or instruments May contain mercury. **Tool boxes** May contain explosives (power rivets), compressed gases or aerosols, flammable gases (butane cylinders or torches), flammable adhesives or paints, corrosive liquids, lithium batteries, etc. Torches Micro torches and utility lighters may contain flammable gas and be equipped with an electronic starter. Larger torches may consist of a torch head (often with a self-igniting switch) attached to a container or cylinder of flammable gas. Unaccompanied passengers baggage/ personal effects . May contain items meeting any of the criteria for dangerous goods, such as fireworks, flammable household liquids, corrosive oven or drain cleaners, flammable gas or liquid lighter refills, camping stove cylinders, matches, bleach, aerosols, etc. Vaccines May be packed in dry ice (solid carbon dioxide).

Note:

Articles and substances which do not fall within the definition of dangerous goods, and which in the event of leakage may cause a serious clean-up problem or corrosion to aluminum on a long term basis, must be checked by the shipper and freight forwarder

to ensure that the packaging is adequate to prevent leakage during transportation. Such items may include brine, powdered or liquid dyes, pickled foodstuffs, etc.