



EMERGENCY MANAGEMENT GUIDE FOR BC PORK PRODUCERS

An interactive guide for BC pork producers to
prepare for and mitigate the impact of potential
emergencies on farm

Prepared for
BC Ministry of Agriculture
Prepared by Zamaca Consulting with
BC Pork Producers' Association

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Disclaimer

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Emergencies can be devastating to a farming operation. This Emergency Management Guide provides a resource for pork producers in British Columbia to prepare for the worst while hoping for the best. It provides educational materials on various natural and human-caused threats to any operation, as well as an opportunity for you to tailor responses your farm would follow if in the event of any such emergency.

While most producers instinctively know what to do without the need to open a manual, documenting the actions needed to protect your most important assets is valuable for two reasons:

- An emergency guide for your hog operation helps inform others on how best to assist during an emergency, including family members, farm staff, neighbours, and first responders.
- An emergency guide adapted specifically for your farm demonstrates the “due diligence” you have taken in managing your risks.

This Guide has two sections. Following this Introduction, you will find a section you can tailor specific to your farm, including information on mapping, insurance, and additional resources and contacts.

The second section consists of a series of ten tabs, containing preparedness and response actions you can adapt to best fit your farm and business situation, and allows you to assemble specific “action items.”

There is a section for you to record your employee training for any relevant courses, such as First Aid or Canadian Livestock Transport. You will find pocket pages to store your MSDS sheets, certificates or other documents you might need handy.

The Guide is placed in a three-ring binder so that you can easily update your response information. Sections can be removed for use in other manuals such as *WorkSafe BC* and *Canadian Quality Assurance Program (CQA)*. Updates or other materials can be added to this binder.

This format invites you to record your own plans for managing emergencies before, during, and after events occur. The goal is to have a farm-specific Emergency Management Guide that is simple enough for any family member or farm employee to understand and use.

Electronic copies of this *Emergency Management Guide* can be found at the www.bcpork.ca, and the Ministry of Agriculture’s emergency planning page, <https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/business-market-development/emergency-management>.

Hard-copy workbooks are available through the British Columbia Pork Producers’ Association (BCPPA) or at the nearest Ministry of Agriculture office.

The BCPPA hopes this Emergency Management Guide will help you prepare for and minimize the impact of threats to your home and farm, as well as protect your family, employees, and animals.



- 1 Hog producers are responsible for the safety and security of their livestock and employees.
- 2 Documentation of Emergency Management and Response Plans shows due diligence on the part of the producer.
- 3 It is the producer's responsibility to ensure they have appropriate insurance coverage.
- 4 All owners and employees should be made aware of the farm operation's Emergency Management Plans in order for appropriate assistance during an emergency.
- 5 Consideration should be given to including other farming operations or residences that co-exist with the hog operation into the Emergency Management Plan.



CONTACT INFORMATION

Every emergency guide should include basic information about the operation to help outside organizations provide appropriate assistance. While there is no need to reproduce farm information you may have elsewhere, ensure the following details are readily available.

Farm Name

Premise ID

Address

Directions

Landline

Mobile

Email

Owner's Name

Address (if different than Farm Address above)

Home phone

Mobile

Email

Manager's Name (if different than above)

Address (if different than above)

Home phone

Mobile

Email

How many individuals are normally on the farm?

Indicate if family, staff, tenants – names and phone numbers

Other information

EMERGENCY CONTACTS

Contacting outside agencies and organizations for assistance is usually one of the most helpful actions when emergencies strike. These days, many farmers carry important contact information on their mobile devices. However, a printed list of emergency contacts may allow family members or staff to make important contacts on behalf of the owner/ operator.

Organization	Name	Telephone
Ambulance		9-1-1
Bank		
BC Pork		604-287-4647
Doctor		
Electrical Company		
Electrician		
Emergency Management BC (Regional Office)	South West (Fraser Valley)	604-586-4390
Faith-Based Organization		
Feed Supplier		
Fire / Rescue		
Friend / Neighbour		
Fuel Dealer		
Insurance Agent		
Internet Provider		
Machinery Dealer		
Min. of Agriculture (local office)		Fraser Valley 604-556-3001

EMERGENCY CONTACTS

Organization	Name	Telephone
Min. of Environment (local office)		Lower Mainland 604-582-5200
Municipal or Regional District		
Emergency Program Coordinator		
Natural Gas Company		
Out-of-province Contact		
Plumbing/Refrigeration		
Poison Control		1-800-567-8911
Police / RCMP		9-1-1
Regional Agrologist		
Spill Reporting		1-800-663-3456
Telephone Provider		
Tenant		
Towing Service		
Trucker / Livestock Hauler		
Veterinarian (local)		
Veterinarian (other)		
Other Contacts		

A map on the wall may be all that you require for day-to-day operations. However, dealing with actual emergencies often calls for assistance from others who may not share your historical knowledge of your farm. Maps are essential for engaging other agencies, such as the local fire department, flood response teams, or the provincial Wildfire Management Branch.



A map is also indispensable in planning for emergencies. It can show the relationship between hazards on your land, such as flooding, and your assets. Maps help you develop practical response steps, such as moving animals to high ground or areas of natural shelter.

Useful maps contain simple features that communicate the essentials of your farming operations. Depending on your situation, a map for your *Emergency Management Guide* should include the following:

Elements of a Farm Map for Emergency Planning

- North Arrow
- Scale
- Property boundaries, Crown land (if applicable)
- Pipelines and wells, oil or gas (if applicable)
- Railways, if applicable
- Roads and road access, showing gates and on-site vehicle access ways
- Sandbag locations to protect structures from surface flooding
- Slope of land (drainage directions)
- Structures, including main house, barns, storage buildings, equipment storage yards
- Watercourses (ponds, streams, wetlands), with floodplain boundaries (if applicable)
- Water wells, existing or abandoned
- High risk areas for first responders (fuel storage, pesticide storage)

As a farmer, you likely have maps and know their value. The challenge comes with creating maps that are readily shared with others, whether with farm workers, neighbours, or first responders.

Here are a few ideas:

Existing Map: One simple way to include an existing map in your Emergency Management Guide is to photograph or scan it, and include a printed copy in this binder. If you participate in the Environmental Farm Program, you may already have a map of your farm and operations. Consider adding a copy to your Emergency Management Guide.

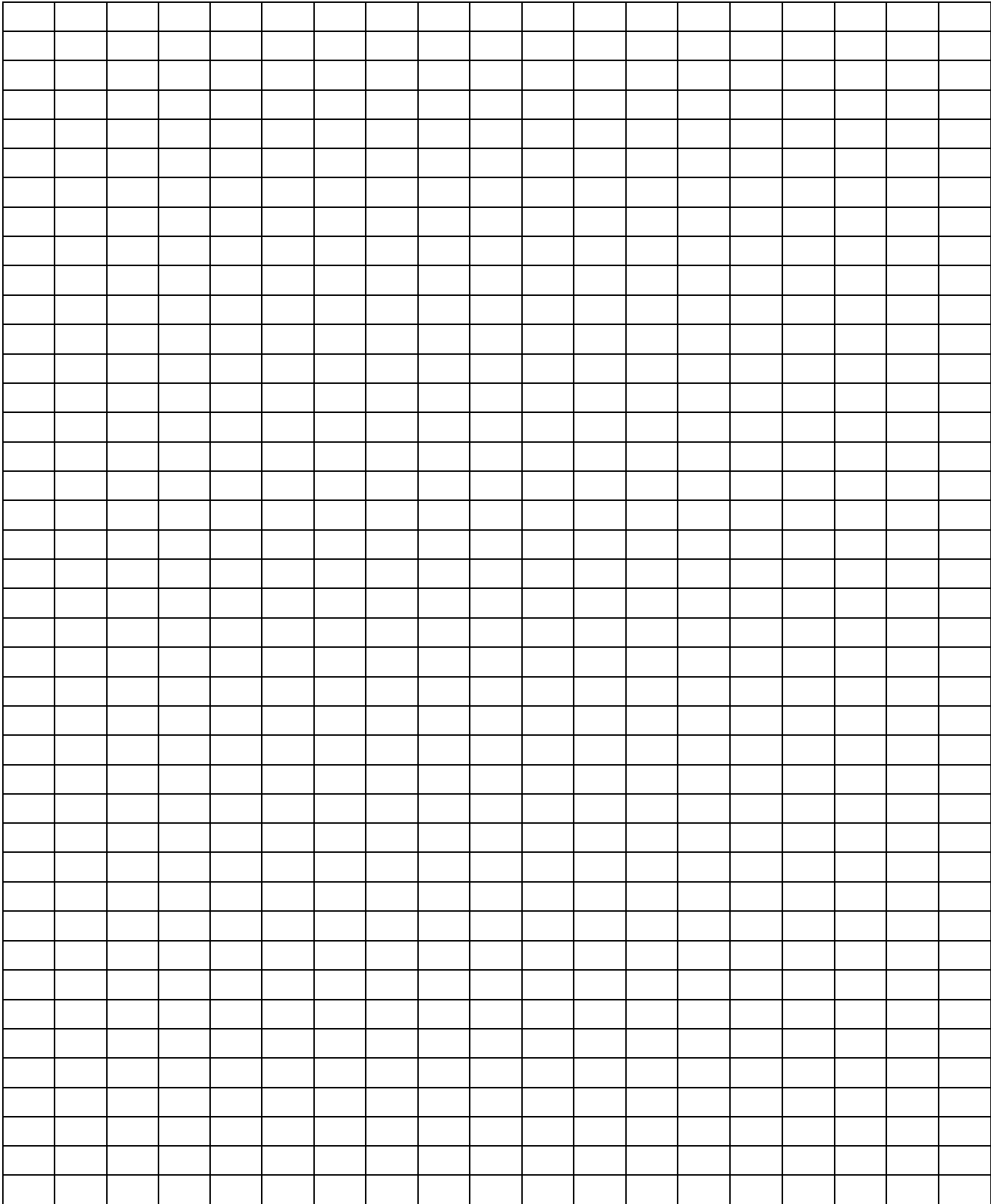
Obtain a Map: You may be able to obtain a map from a local government office, such as your municipality or regional district, or from a provincial agency. Contact your regional branch to inquire the availability of such maps.

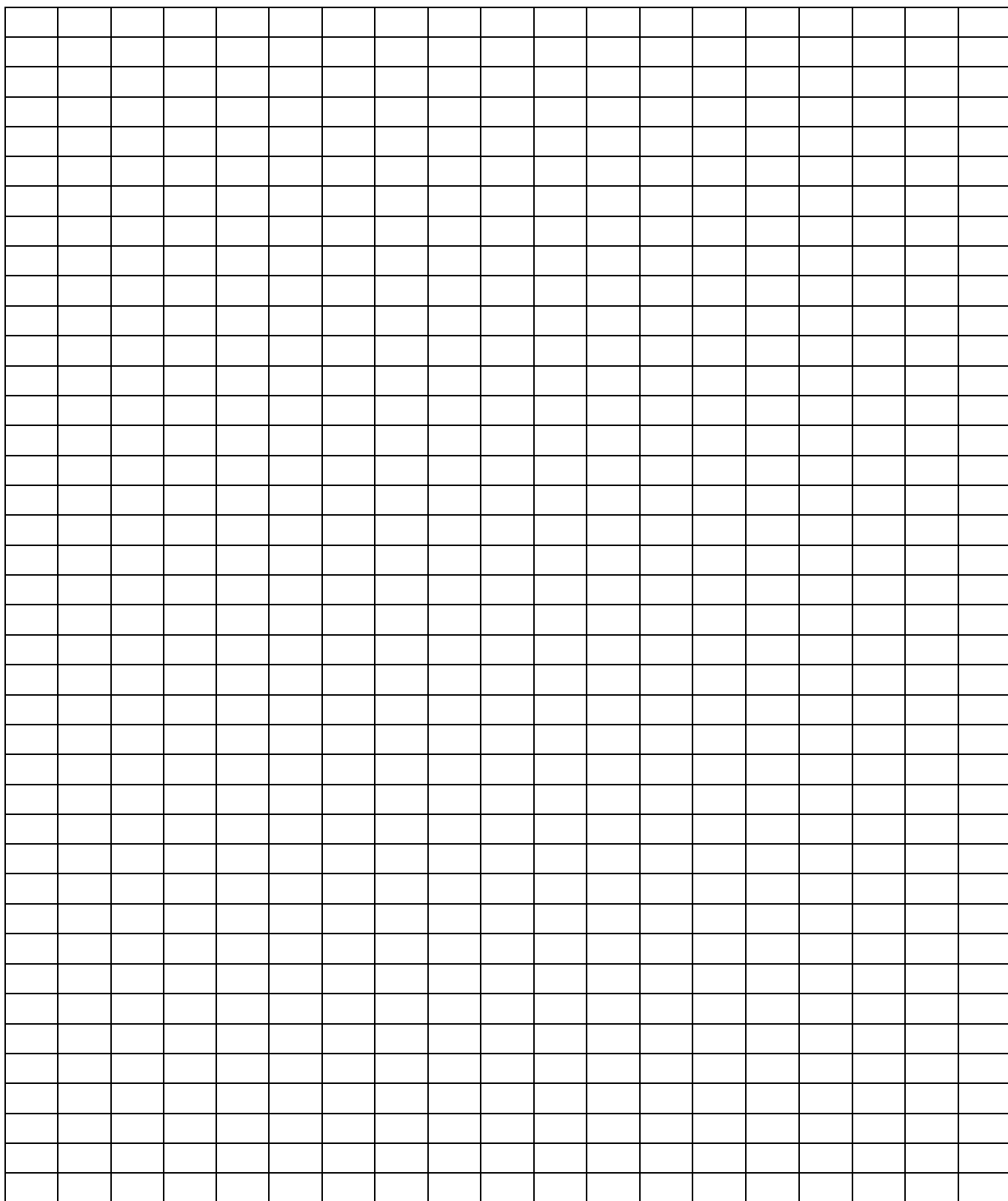
Google Earth: You may wish to create a new map using readily available resources, like Google Earth. Google Earth is a free, downloadable program that allows you to not only zoom in to every section of your farm, but to tag, label, and draw a boundary around a piece of property. To download Google Earth, see: <https://www.google.com/earth/versions/>

DataBC: The Provincial Government offers a number of useful files that can be used with Google Earth. One service is the DataBC site. It can show with accuracy the boundaries of your private land, Crown leases, and range licenses. Note that this feature is only available in Google Earth, not Google Maps. The DataBC site can be accessed at: www.data.gov.bc.ca/

Other maps you should have posted on office walls, beside doors, etc. are:

- Barn Evacuation Map – If the main door used to enter and exit a barn is blocked or otherwise inaccessible, employees should know what the best route is for them to exit the barn if an emergency calls for it, such as fire or noxious gases.
- Fire Extinguisher Map – a clearly labelled map should show where water sources are and all available fire extinguishers.





The consequences of a major emergency on an individual farm may be catastrophic. Some impacts cannot be prevented regardless of preparedness. Therefore, insurance plays an important role in protecting you from low-probability, high-consequence disasters such as floods, wildfires, or animal disease emergency.

Farmers in BC have access to several approaches to managing their financial risks, as noted below. Refer to the specific links for detailed program information.

Commercial Insurance

Private insurance is generally available to cover hog production losses from emergencies, such as those addressed by this Guide. Coverage may include losses due to livestock injuries or mortalities, temporary livestock relocations, and infrastructure losses (i.e., barns and equipment).

As an important step in managing risk, pork producers in BC should understand what is covered under their insurance policies and what may be excluded. Talk with your insurance broker or agent about the details.

The Insurance Bureau of Canada can help ranchers find available coverage for business losses through private insurance programs. Its member companies represent 90% of the property and casualty insurance market in Canada. Their website: www.ibc.ca/

Federal/Provincial Government – Risk Management Programs

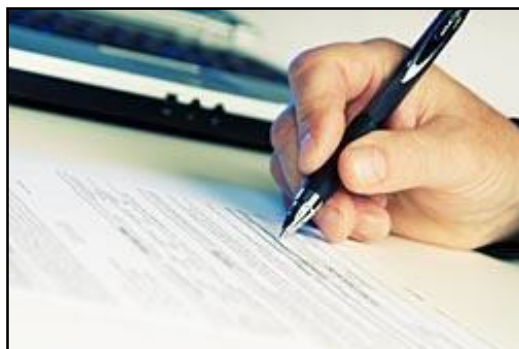
The federal and provincial governments provide a suite of cost shared risk management designed to build the productivity, profitability, and competitiveness of the agricultural sector in the province.

AgriStability: This federal-provincial risk management program helps producers cope with declines in farm income due to market variability, production losses, and increased costs of production. AgriStability covers losses associated with increased feed costs, or decreased revenue from the sale of livestock.

AgriRecovery: This program provides a coordinated government framework for disaster relief on a case-by-case basis. Funding may be available for losses not covered by other programs, and may be cost-shared between the province and the federal government.

AgriInvest: This program offers a “savings account” approach for producers, supported by various levels of government. It covers small income declines and allows for investments that help producers prevent losses and improve market income.

More information on these risk management programs is available at:
<https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/programs>



Emergency Management BC

Under the BC Emergency Program Act, farmers may be eligible for financial assistance for losses incurred in disasters for which insurance was not available. For details, see www.embc.gov.bc.ca/em/dfa_claims/dfa.html.

Inventory Importance

An emergency illustrates the importance of having an up-to-date farm and livestock inventory. Producers should document any loss of livestock, buildings or equipment in writing, using the inventory to verify losses. Consider taking photographs and videos of damage, if possible, noting the time and date.

A number of emergency events may require you to relocate – evacuate – livestock to safer areas on the farm grounds or nearby, such as alternate barns.

Emergency Management BC and the BC Ministry of Agriculture have developed a policy bulletin to support livestock evacuations under specific conditions. Agricultural business operators need to apply directly through their local authority Emergency Operations Centre (EOC).

This process consists of:

1. **Evacuation Alert:** Be ready to leave on short notice. If you leave before or during this alert, it's called a voluntary evacuation.
2. **Evacuation Order:** You are at risk. Leave the area immediately. Local police or RCMP enforce evacuation orders.
3. **Declaration of Local State of Emergency:** Declared by a local government when an emergency or disaster within its jurisdiction requires access to the extraordinary emergency powers of the Emergency Program Act.
4. **Evacuation Rescinded:** All is currently safe. You can return home. Stay tuned for other possible evacuation orders or alerts.

You as a producer are solely responsible for decisions to evacuate livestock and pets.

It is critical that producers understand that people are a much higher priority than farm operations and livestock for the emergency responder.

Accordingly, any decision to evacuate will need to be made so that the evacuation itself can proceed to a satisfactory conclusion without interfering in the movement of people and emergency services. This requires pre-planning and an early decision.

Integrated Response Model – Sharing the Responsibility

Source: EMBC, Provincial Emergency Program



If an emergency hits your farm, you need to know who can help. The type and severity of the emergency will guide the level that each party will be involved.

You could be working within an emergency response process that involves numerous groups from the public sector that may include, but not be limited to:

- ☐ Fire Departments
- ☐ Police Departments
- ☐ Local Government, e.g. Municipalities / Towns / Cities
- ☐ BC Ministry of Agriculture (AGRI)
- ☐ Emergency Management BC (EMBC)
- ☐ BC Ministry of Environment (MOA)
- ☐ The BC Pork Producers Association (BCPPA)
- ☐ The BC Hog Marketing Commission (BCHMC)
- ☐ Canadian Food Inspection Agency (CFIA)

Emergencies are typically managed from the ground up, initially relying upon local authorities until the capacities of these are overcome; at which point provincial authorities are involved until they are overcome; at which point federal authorities are involved. Specific organizations may have legislated authority from the outset, depending upon the emergency involved. The most well-known of these, is the CFIA, or possibly AGRI, with responsibility for responding to certain reportable or notifiable diseases.

Integrated Response Model – Sharing the Responsibility

Source: EMBC, Provincial Emergency Program



EMBC was formed to be the lead coordinating agency in the provincial government for all emergency management activities. EMBC provides executive coordination, strategic planning, and multi-agency facilitation and strives to develop effective working relationships in an increasingly complex emergency management environment.

EMBC works with local governments, First Nations, federal departments, industry, non-government organizations and volunteers to support the emergency management phases of mitigation/ prevention, preparedness, response and recovery. Additionally, EMBC engages provincial, national and international partners to enhance collective emergency preparedness.

Running a farm or business means you learn to expect the unexpected. However, when events that are totally out of the ordinary course of business occur, if you don't have a plan in place, the resulting damage to your business can be catastrophic. Floods, fires, earthquakes, robbery, forgery, computer piracy - Mother Nature can strike, and accidents can happen.

While you can't control the weather, or stop other people from causing accidents or stealing, you can take steps to minimize these sorts of risks. Three steps to keep in mind are:

1. Plan for emergencies/disasters.
2. Implement security measures.
3. Consider obtaining appropriate insurance.

Some security measures to consider implementing (depending on the area you live in and the level of comfort you have):

- ☐ Fence around the property
- ☐ Security gate at all access points
- ☐ Motion lights around the yard/buildings
- ☐ Security alarm for the office.
- ☐ Locks on all barn and office doors.

Organizing your office and files can save a lot of time if an event occurs. Proper filing of paper and electronic files and reports can minimize time spent looking for information before, during and/or after an emergency. Some recommended tips to consider for improving your organization include:

- ☐ External Hard Drive to back up computer files
- ☐ Online storage (e.g. *Carbonite*)
- ☐ Keep original papers at a bank



There are a few other measures that are relatively easy to implement and can be very effective with respect to emergency preparedness. One is to use a fire proof safe in



the office to store those important documents that you need on site (e.g. rent/lease agreements, employee contracts, etc.). By storing papers in a fireproof safe, you are minimizing the chance they are accidentally destroyed by human error or are damaged in a fire.

Using surge protector extension cords and multi-plugs are another great investment. Ensure all computers and hard drives are connected through a surge protection unit, and you have greatly reduced if not eliminated the potential of losing all of your electronic data from power surges, power failure or the like.

Most hog farmers live on the property of their farming operation. Consideration should be given to using timers for lights in the house and/or barn areas when going on vacation or extended leave, even if you have farm employees coming onto the site to work each day. By using the timers, it gives the appearance you are home or in the barn/shop in case anyone wandering around is curious and looking for a quick grab of electronics or other equipment you may have in the yard or in a building.

The last recommendation when planning for potential emergencies is to have your passwords written down and stored in a safe place. We don't like to think about it, but medical emergencies do happen. By having passwords stored somewhere safe where your loved ones can access them minimizes any confusion or stress they may suffer if a medical emergency occurs.

Contact your insurance provider to discuss your coverage and ask if there's more you can do to protect yourself. See if your coverage is right for you, if a natural or human-caused emergency were to take place on your farm tomorrow.

Summary

The risk of structure fire can be devastating on a hog farm. Within a few minutes, precious animals can be lost, as well as thousands of dollars in equipment and infrastructure.

In British Columbia, approximately half of the wildfires are caused by human activities and half occur naturally from lightning strikes. If your operation is in a wildland region, sooner or later you will likely contend with the spread of a wildfire.

Barns, feed and equipment storage sheds, as well as farm residences are all exposed to possible loss from fire. Farm structures usually contain plentiful materials to serve as fuel, and are typically well-ventilated. A heat source to ignite a fire can take many forms, such as spontaneous combustion of hay, bedding, lightning, or an engine exhaust spark. Many simple protection and prevention techniques can reduce potential risk of a structure fire.

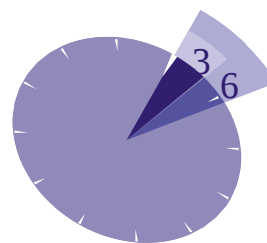
Smoke Inhalation

Smoke inhalation causes immediate irritation to the lining of a hog's respiratory system.

Damage can occur within a few minutes in areas of high smoke concentrations, or within hours in areas with low smoke concentrations.

Smoke from a Structure Fire Can Kill Animals

It only takes 3 to 4 minutes of the fire starting for a structure be filled with smoke. A structure can be completely engulfed in less than 6 minutes.



Preparation

My preparedness steps for wildfire include the following:

- ☐ Review the wildfire history in my area, such as neighbours, local emergency coordinator, forestry, etc.
- ☐ Identify and maintain the equipment (i.e., harrow, plow, water truck, tools) needed to fight an approaching grassfire or wildfire.
- ☐ Clear vegetation and wood debris within 10 metres of any farm structure.
- ☐ Reduce vegetation and wood debris within 10 to 30 metres of farm structures by thinning and pruning vegetation.
- ☐ Store hay away from roads or fences, and surround bale stacks with a bare area or fuel-reduced strips.

My preparedness steps for structure fire include the following:

- ☐ Prohibit smoking in and around barns.
- ☐ Inspect electrical systems regularly and correct problems.
- ☐ Remove accumulated dust from electrical fixtures, heaters, etc. on a regular basis.
- ☐ Keep the number of appliances at a minimum in the barn. Use space heaters only when someone is in the barn.
- ☐ Obtain and install portable fire extinguishers near the exits to all buildings. Ensure all farm workers and family members know how and when to use portable extinguishers, and where they are located (perhaps have a map posted in the barn office).

- ☐ Identify water sources that could be used for fire suppression.
- ☐ Ensure hay is dry before storage. Store hay outside the barn in a dry, covered area, if possible.

Response

My response steps for structure fire include the following:

- ☐ If necessary, evacuate employees/visitors to an agreed safe meeting place.
- ☐ Notify the fire authority immediately. In my area, the number is_____.
- ☐ Assess the fire. Attempt to contain or extinguish a small fire only if this can be done safely.



NOTE: In case of partial loss to a farming operation/barn, additional actions may be required (e.g. replacement of feed, power restored to still-active barns, etc.)

Resources

Current Wildfire Situation:

<https://www2.gov.bc.ca/gov/content/safety/wildfire-status>

Wildfire Information: [1-888-3FOREST \(1-888-336-7378\)](tel:1-888-3FOREST)

Emergency Management BC:

<https://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery>

FireSmart Manual: <https://firesmartbc.ca/>

Additional information in this binder:

Evacuation Map (pages 11-12)

Secondary Contact Numbers (pages 7-8)

Map of Fire Extinguishers (pages 11-12)

In case of a fire emergency, our farm will:

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DO NOT:

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Summary

Floods can impact both animal and human health. Producers can plan more effectively by assessing the flood risk on various parts of the operation. Response options for flooding will depend on several factors, such as current snow load, ground conditions, and the current and forecasted precipitation. Response options will also depend upon local topography and the distribution of the farm area.

Common Flooding Terms

High Streamflow Advisory: River levels are rising or expected to rise rapidly, but no major flooding is expected. Minor flooding is possible.

Flood Watch: River levels are rising and will approach or may exceed the banks. Flooding of areas adjacent to affected rivers may occur.

Flood warning: River levels have exceeded the top of the bank or will exceed it imminently. Flooding will occur in areas near affected rivers.

Floodplain Maps

Floodplain maps are available for your area at the BC Ministry of Environment website:

<https://www2.gov.bc.ca/gov/content/environment/air-land-water/water/drought-flooding-dikes-dams/integrated-flood-hazard-management/flood-hazard-land-use-management/floodplain-mapping>

Preparation

My preparedness steps for flooding include the following:

- ☐ Review the flooding potential in my area, through BC government River Forecast Centre.
- ☐ Investigate and identify alternative livestock accommodation on higher ground if animals need to be moved quickly (if possible).
- ☐ Identify livestock haulers that could assist in the movement of animals on short notice.
- ☐ Consider making arrangements with processors to ship animals that are approaching market weight.
- ☐ Move any equipment (i.e., excavator, tractor, tools) to higher ground if available.
- ☐ Move any pesticide, fertilizer or other chemical to higher ground if possible.
- ☐ Shut off electrical power to areas where flooding is imminent.
- ☐ Manure pits should be emptied and the manure spread to land two weeks prior to expected flooding of those fields.
- ☐ In regions where high water tables are expected, manure pits should be filled with water to the half way point to prevent the bottom of the manure pit from breaking due to increased hydrostatic forces.
- ☐ If the farm is above the flood plain, make sure there is adequate feed, bedding material, medications, etc. on hand for an extended period.
- ☐ Ensure any generator is operational and extra fuel is on hand if in the event of a power outage due to flooding.
- ☐ Ensure wellheads are protected if applicable.
- ☐ Wet hay may spontaneously combust due to natural composting processes. Consider storing hay away from buildings in the event that the hay storage catches fire after flood waters have receded.

Response

My response steps for flooding include the following:

- ☐ If necessary, evacuate employees/visitors to an agreed, safe meeting place.
- ☐ Move animals as able, whether it's to the processing plant or other appropriate livestock housing.
- ☐ If safe to do so, take pictures of the flood damage as it's occurring for insurance purposes later.

NOTE: In case of partial loss to a farming operation/barn, additional actions may be required (e.g. replacement of feed, power restored to still-active barns, etc.)

Resources

River Forecast Centre:

<https://www2.gov.bc.ca/gov/content/environment/air-land-water/water/drought-flooding-dikes-dams/river-forecast-centre>

Emergency Management BC:

<https://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery>

Flood Preparedness: <https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/business-market-development/emergency-management/freshet-and-flood>

Additional information in this binder:

Evacuation Map (pages 11, 12)

Secondary Contact Numbers (pages 7, 8)



In case of a flooding emergency, our farm will:

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DO NOT:

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Summary

Some disease threats are of special significance because they are highly contagious, spread rapidly, and cause severe animal illness and often death. They are often called foreign animal diseases (FADs), emerging, or “exotic” diseases. The effect on livestock producers can be devastating and result in loss of public confidence, restrictions on pork movement, and the disruption of trade. Animal disease outbreaks can cost British Columbian pork producers millions of dollars. Even an outbreak in another province or country can impact the entire supply chain within BC.

How Animal Disease Spreads

Understanding how disease-causing organisms spread may help you identify ways to reduce transmission. Depending on the type of disease, methods of transmission may include:

- ❑ Direct contact: Entry of disease agent into open wounds, mucous membranes, or skin; may occur by contact with blood, saliva, nose-to-nose contact, rubbing, or biting from an infected animal.
- ❑ Mechanical transfer: Transfer by inanimate objects (e.g. vehicle, clothing, footwear).
- ❑ Aerosol: Infectious droplets passed through the air from one animal to another.
- ❑ Ingestion: Consumption of disease agent in contaminated feed or water or by licking or chewing contaminated objects.
- ❑ Vector-borne: Spread by insects, rodents, birds (i.e. flies, starlings, mites, rats).



Important Viruses to Be Made Aware Of:

Delta Coronavirus (DCV) and Porcine Epidemic Diarrhea (PED) Virus

PED virus is a coronavirus that infects the cells lining the small intestine of a pig, causing severe diarrhea and dehydration. Older hogs usually only have a little diarrhea (sometimes none at all) and may be inappetent for a short while. Newborn piglets usually die within five days of contracting the virus. It is not a human health concern. With its discovery in the United States in 2013 and subsequent appearance in Canada early 2014, the BC hog industry has made significant improvements to their biosecurity on farms and at co-mingling sites throughout the province.

Preparation

My preparedness steps for disease threats include the following:

- ❑ Ensure my Canadian Quality Assurance (CQA) Program evaluations are current.
- ❑ Clearly identify the Controlled Access Zone (CAZ) and Restricted Access Zone (RAZ) and restrict access to only those that are necessary.
- ❑ Review Danish Entry procedures with all employees including transport vehicle drivers, maintaining a clear separation between “outside” and “inside” shoes, clothing and their dedicated areas.
- ❑ Ensure adequate cleaning and disinfecting procedures are in place and followed for the farm’s transport vehicle(s), driveways and yard, load out area(s), in-barn areas and any equipment used.
- ❑ Confirm processing plant has proper cleaning and disinfecting practices at unloading areas, and relevant surroundings, that are being carried out at a frequency approved by a veterinarian.

Response

My response steps for the positive detection of disease may include the following:

- Inform BC Pork and the farm veterinarian. Develop a plan for control, containment and elimination of the disease.
- Grant permission to BC Pork to inform all necessary industry contacts.
- Participate in an investigation of the potential contacts that have occurred or will occur (epidemiological investigation).
- Identify all suppliers and others that may visit the farm of the status and minimize (only those absolutely necessary) visitors into the RAZ or CAZ.
- Communicate with the processor, veterinarian and BC Pork about a shipping schedule, striving to ensure no deliveries happen after the contaminated pigs are delivered.
- Delay marketing as long as possible to reduce the level of virus in the marketed pigs and cull sows.
- Fill barn with enough breeding stock to last at least 7 months.
- Confirm sites where pigs could be raised allowing a break in production and avoiding further contamination of the BC environment if deemed necessary by the herd veterinarian.
- Manure handling strategies – adapted as per herd veterinarian recommendations.
- Schedule all deliveries and visits (feed, dead stock) with assurance of proper wash and disinfect protocols between sites.
- If appropriate, test the CAZ for disease presence.

Resources

Canadian Quality Assurance (CQA) Program: <http://www.cqa-agc.ca/index-e.php>

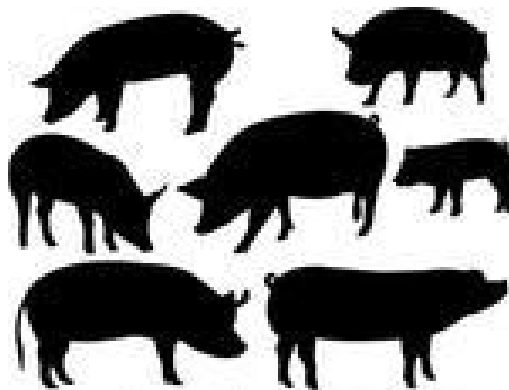
CFIA Reportable Diseases: <http://www.inspection.gc.ca/animals/terrestrial-animals/diseases/reportable/eng/1303768471142/1303768544412>

Canadian Swine Health Board: <https://www.cpc-ccp.com/swine-health>

Additional information in this binder

Secondary Contact Numbers (pages 7, 8)

Mass Carcass Disposal Information (Mass Mortality) (page 57, 58)



In case of an animal disease emergency, our farm will:

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DO NOT:

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Summary

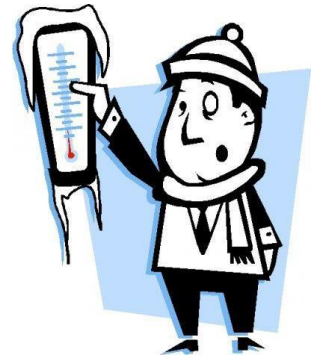
Extreme temperatures generally do not affect pigs while in barns, however they can be at great risk during transport if proper precautions are not taken. During extreme weather events (e.g. storms, high winds, unusually long stretches without rain) subsequent emergencies can occur, such as power outages, fires or disease spread.

Extreme Cold/Winter Conditions

Preparation

My preparedness steps for extreme cold include the following:

- ❑ Arrange for feed and medical supplies in case of road closures, if appropriate.
- ❑ Ensure water supplies are insulated from freezing temperatures.
- ❑ Install alternative heat source, if required.
- ❑ Identify alternate sources of fuel.
- ❑ If road closures are common in your area during extreme winter conditions, you may want to investigate the possibility of taking animals close to market weight to the processing facility.
- ❑ If needed, bedding for transport should be brought on farm (Bedding requirements can be found in the Canadian Livestock Transport (CLT) Certification Program resource binder).
- ❑ If needed, have boarding available to install on transport vehicles to minimize impact of wind and cold on the animals (Winter Boarding Recommendations can be found in the CLT Certification Program resource binder).



Response

My response steps for incidents of extreme cold and winter weather include the following:

- ❑ Engage secondary power source if necessary.
- ❑ Keep driveway/lane to barn as clear as possible for vehicles.
- ❑ See section on Power Outage for response actions if extreme weather affects availability of power to the barn(s).
- ❑ Monitor animals for signs of dehydration, frostbite and stress both in the barns and during transport.

Extreme Heat/Drought Conditions

Preparation

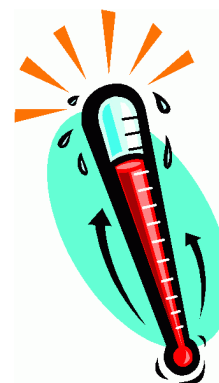
My preparedness steps for extreme heat include the following:

- Ensure ventilation system, fans are in good working order.
- Inspect water lines to ensure no blockages or breaks.
- If the barns are quite full, you may want to investigate the possibility of taking animals close to market weight to the processing facility to reduce body mass in the barns.
- Investigate options to provide water sprinkling of pigs to help keep them cool.

Response

My response steps for incidents of extreme heat include the following:

- **NEVER** board or bed transport trailers during extreme heat.
- Decrease transport loads and travel during early morning or evening, if possible, avoiding any stopping during transport.
- If possible, provide water sprinkling for animals to help them keep cool.
- Monitor animals for signs of dehydration and heat stress both in the barns and during transport.



Resources

Canadian Livestock Transport Certification Program: <http://www.livestocktransport.ca/en/>

Emergency Management BC: <https://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery>

BC Ministry of Environment – Drought Information:

<https://www2.gov.bc.ca/gov/content/environment/air-land-water/water/drought-flooding-dikes-dams/drought-information>

Additional information in this binder

Secondary Contact Numbers (pages 7, 8)

In case of extreme weather emergencies, our farm will:

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Summary

We live in an earthquake zone where over 1,200 small earthquakes are recorded each year. There is a real risk that one of these could be “the big one”. It could happen at any time of the day or night; on a weekend or a workday, in any season and in any weather.

What to expect during an earthquake

Small or moderate earthquakes:

- These may last only a few seconds and represent no emergency risk.
- Minor rattling of objects may occur.
- You may feel a slight quiver under your feet if you are outside.
- If you are close to its source, you may hear a loud bang followed by shaking.

Large earthquakes:

- These can last up to several minutes and constitute a natural disaster if its magnitude is sufficiently large for the region.
- The ground or floor will move, perhaps violently, possibly making you feel dizzy and/or unable to “walk”
- If you are far away from the source, you might see swaying buildings or hear a roaring sound.
- Furnishings and unsecured objects could fall over or slide across the floor or be thrown with damaging force across the room.
- Windows may break, fire alarms/sprinkler systems may be activated, and the power may go off.

Preparation

My preparedness steps for earthquakes include the following:

- ☐ Know in advance where the safest spots are in any farm structures, avoid windows, heavy objects, shelving or furniture that could tip over.
- ☐ Have a battery-operated radio available.
- ☐ Know where shut-off valves are for gas, power, water, etc. Train all farm workers, family members how to turn off these supplies.
- ☐ Establish a meeting place for all farm employees and those residing on the property to gather at it is safe to do so after an earthquake.
- ☐ Discuss earthquake insurance with your insurance provider.

Response

My response steps for earthquakes include the following:

- ☐ Treat any injured persons – first yourself, then others.
- ☐ If you smell gas, turn off the source. Check for fires, broken glass, weakened walls.
- ☐ If everyone is safe, call the out-of-province emergency contact to report your status. If not, phone your emergency response number (9-1-1).

Resources

Emergency Management BC: <https://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery>

Additional information in this binder

Secondary Contact Numbers (pages 7, 8)

In case of an earthquake emergency, our farm will:

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Summary

Producers may have to deal with hazardous materials accidentally spilled on their land, such as agri-chemicals, fertilizers, and petroleum products. Farm operators have a responsibility to protect the environment and the public, as well as their operations after a spill. Employers have a responsibility to be aware of the regulations that apply to the safe operation of the facility, and providing a safe workplace for their employees. Knowledge of a few basics can go a long way toward meeting these responsibilities.

Workplace Hazardous Materials Information System (WHMIS)

WHMIS is a Canadian system that was developed to provide information about the safe handling and storage of hazardous materials. WHMIS programs include appropriate product labeling and handling, worker education and training, procedures identified for safe handling, storage, disposal and emergency clean-up, and an annual program review. Material Safety Data Sheets (MSDS) are information sheets that should be readily available for any controlled product that is received on the farm. More information on this can be found at <http://agsafebc.ca/>. It is encouraged that all farms have a WHMIS program in place.

Spill Reporting Requirements

Farmers are required to report spills above these limits to

Emergency Management BC at 800-663-3456:

Fertilizer spills, granular or liquid	Greater than 50kg or 50L
Pesticide spills	Greater than 5kg or 5L
Petroleum spills	Greater than 100L
Manure spills	Greater than 200kg or 200L



Spill Kits should include:

1. Personal Protective Equipment (chemical-resistant), including gloves, footwear, apron, disposable coveralls, eye protection, and respirator
2. Containment “snakes” or “tubes” to control liquid spills
3. Absorbent materials (i.e., absorbent clay, kitty litter, fine sand, sawdust, vermiculite)
4. Plastic cover for dry spills
5. Spray bottle filled with water to mist dry spills
6. “Caution tape” to isolate the area
7. Shovel, broom, and dustpan
8. Heavy duty disposal bags with ties
9. Duct tape
10. Sturdy plastic container with lid to store contents of kit and to hold volume of recovered material
11. A permanent marker to label container contents

Preparation

My preparedness steps for management of hazardous materials include the following:

- Create a farm-specific list of controlled products and hazardous materials.
- Read packaging labels for information on proper use, handling, and actions in case of spills.
- Obtain a copy of the Material Safety Data Sheets (MSDS) for all chemicals, and keep copies in the office.
- Have a map of chemical storages, fuel tanks, fertilizer storage, etc. available.
- Assemble a Spill Kit and keep it in a location that is accessible by ranch workers at all times.
- Ensure all employees are trained on the response procedures in the event of a spill and know where maps and spill kits are located.
- Have a map of fire extinguishers, spill kits easily accessible to all employees.
- Use appropriate containers to store chemicals.
- After using application equipment, ensure valves are closed, hoses empty, and pumps are turned off.
- Clean equipment frequently.
- Inspect equipment routinely for damage that could cause a leak. Keep a record of inspections and repairs.

Response

My response steps to a hazardous material spill include the following:

Contain and Control

- Approach a spill from a safe direction, upwind or upstream.
- Attempt to identify the type of product involved, if safe to do so.
- Avoid chemical spills that are reacting (i.e., hissing, bubbling, smoking, gassing, or burning).
- If the spill is too big to control and clean up, call **9-1-1** or local emergency number.
- Contact **Emergency Management BC** at **1-800-663-2345** if spill volume exceeds reportable level.
- Move the Spill Kit to a safe location near the spill.
- Put on Personal Protective Equipment: Gloves, footwear, apron, disposable coveralls, eye protection, and respirator.
- If possible, stop the spill from spreading. Take appropriate steps, such as:
 - a. Place the leaking container into a larger container.
 - b. Close valves, etc.
 - c. Use absorbent material, sandbags, or dig a trench to contain spills.
- Set up barriers to keep people and animals out.
- Stay at the spill site until someone relieves you.

Clean-Up

- ❑ Spread absorbent material on the spill area.
- ❑ Avoid using sawdust. Strong oxidizing chemicals can combust and become a fire hazard.
- ❑ Sweep and scoop all material; work from the outside toward the inside to reduce spread.
- ❑ Scoop material into a drum or container lined with a heavy duty plastic bag. Repeat until the spill is soaked up.
- ❑ Seal the bag. Double bag, label clearly, and dispose of properly.
- ❑ For spills on soil, apply activated charcoal immediately for minor spills.
- ❑ For larger spills, dispose of top 2-3 inches of soil; cover area with 5 cm of lime and fresh top soil.
- ❑ Contact your municipality or regional district for information on safely disposing of contaminated material.

Resources

BC Pork Producers' Safety Guide (FARSHA):

http://farsha.bc.ca/online_assets/category1_item222.pdf

Emergency Management BC:

<https://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery>

WorkSafeBC: <http://www2.worksafebc.com/Portals/Agriculture/Home.asp>

Additional information in this binder:

Secondary Contact Numbers (pages 7, 8)

WHMIS and MSDS sheets for this farm (page 65)

Equipment Maintenance Log (page 64)



In case of an emergency with hazardous materials, our farm will:

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Summary

Manure is a valuable by-product of livestock operations. However, to realize its potential nutrient or agronomic value and to avoid pollution problems, well-planned manure handling and storage systems are essential.

Concerns related to manure handling and storage include:

- Improper manure handling, spillage, storage facility leakage, or overtopping that results in soil or water pollution, or impacts to habitat.
- Insufficient storage that requires manure spreading during high-risk seasons that may result in water pollution.
- Inappropriate field application that may result in water pollution.
- Release of ammonia (NH_3), volatile organic compounds (VOC) and nitrogen oxides (NO_x) which can chemically produce secondary particulate that results in pollution, human health concerns and visibility reduction.
- Release of methane (CH_4) and nitrous oxide (N_2O), greenhouse gases that contribute to climate change and can be harmful to animals and humans.
- Release of hydrogen sulphide or other air contaminants that result in air pollution.
- Release of odours associated with ammonia and other contaminants.

Remember – manure spills are reportable if they are greater than 200kg or 200L.

Preparation

My preparedness steps for manure spills and containment breaches include the following:

- Ensure there is appropriately designed or adequate storage available to accommodate 9-12 months of manure.
- Contain manure during transport to avoid spills.
- Ensure manure is not carried onto public roads by equipment tires.
- Establish and maintain buffers between manure handling and storage locations near and around watercourses.
- In the event of a pipe break when piping manure near watercourses, have a containment method, such as a double-walled pipe within 10 m of the watercourse (suggested) and a low pressure switch to turn off the pump.
- Have a manure spreading plan.
- If applicable, ensure application equipment is maintained.
- Where possible, use air emission and odour-reduction application practices.
- Identify manure haulers that could assist in a clean-up exercise if in the event of a containment breach.



Response

Response steps for manure spills and containment breaches include the following:

- If possible, stop the spill from spreading. Take appropriate steps, such as:
 - a. Close valves, etc.
 - b. Constructing a berm or other containment measures.
 - c. Use absorbent material, sandbags, or dig a trench to contain spills.
- Contact **Emergency Management BC** at **1-800-663-2345** if spill volume exceeds reportable level.

Clean-Up

- Sweep and scoop all material; work from the outside toward the inside to reduce spread.
- Remove manure and soil with excess nutrients for eventual use as a fertilizer or soil amendment.



Resources

BC Environmental Farm Plan Program:

https://www.bcac.bc.ca/sites/bcac.localhost/files/Ardcorp_Program_Documents/EFP/EFP%20Reference%20Guide%20Chapter%203.pdf

BC Ministry of Agriculture Manure Spreading Advisories:

<https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/agricultural-land-and-environment/soil-nutrients/nutrient-management/manure-spreading-advisories>

Additional information in this binder:

Secondary Contact Numbers (page 7, 8)

Equipment Maintenance Log (page 64)

In case of a manure spill emergency, our farm will:

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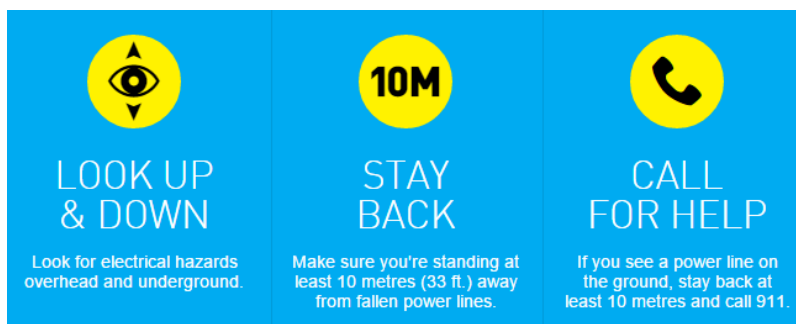
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Summary

Power outages can result from a variety of events, such as a severe winter storm, or other hazards addressed in this Guide. Preparation and appropriate response will minimize the impact of prolonged power outages, and can protect your equipment and your herd.



Preparation

My preparedness steps for power outages include the following:

- ❑ Communications – ensure cell phones are charged as cordless or extension phones that require a connection to an electric outlet won't work.
- ❑ Keep the vet and electrician's phone numbers handy in case of potential problems.
- ❑ Lighting – the location of flashlights or other emergency lighting should be known by all employees as well as a supply of extra batteries should be on hand in the event of prolonged power outages.
- ❑ Equipment – have a list of necessary equipment required to maintain function in order to reduce the electrical load by disconnecting unnecessary equipment if there's a need to minimize use of backup power or there's a regional request for a reduction in power usage.
- ❑ Back-up power – ensure generator(s) are available and in good working order and there's an extra supply of fuel in case of prolonged power outage.
- ❑ Ensure electrical panels are well-marked and breakers can easily be turned off.
- ❑ Ensure sensitive electronic equipment have surge protectors and/or battery back-ups and are protected when power is restored.
- ❑ Identify ventilation needs and options if power is needed to run the ventilation system.
- ❑ Back up computer files frequently.

Response

My response steps to a power outage include the following:

- ❑ Turn off sensitive and/or non-essential equipment.
- ❑ Contact power provider to set up re-connection as soon as possible.
- ❑ Ensure livestock still have access to food and water.
- ❑ Ensure back-up generator or other power source is working.
- ❑ Ensure alternate forms of ventilation are in place.

Resources

BC Hydro Power Outages Map: https://www.bchydro.com/outages/orsMapView.jsp?WT.ac=hp_mh_outmap

Fortis BC Power Outage: <http://fortisbc.com/Safety/EmergencyPreparedness/Pages/Power-outages.aspx>

Additional information in this binder:

Secondary Contact Numbers (page 7, 8)

Mass Carcass Disposal Information (Mass Mortality) (pages 57, 58)

Equipment Maintenance Log (page 64)

In case of a power outage, our farm will:

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Summary

Farm owners, managers, supervisors, and workers all want farms to be safer, healthier and more productive places to live and work. All workers at a hog farm need to be aware of safety and health hazards, endeavor to follow BC's workplace health and safety requirements, and put human health above all else. Some of the daily risks that workers may be exposed to include slips and falls, gases, dust, high noise levels, exposure to chemicals and possibly transmissible diseases.

Preparation

1. Animal Handling Safety

Understanding pig behavior makes the work easier and safer. Knowing the facility setup will facilitate easier animal movement.

- Always know your whereabouts and "escape routes" when working with the animals.
- Be aware that floors may get slippery with water, urine and/or manure.
- Keep alleyways clear to help with trouble-free, stress-free pig movement.
- Use effective tools when moving animals such as chase boards and shaker paddles.

2. Hearing Protection

Noise is a serious concern in hog barns. Noise-induced hearing loss can be the result of exposure to continuous or intermittent harmful noise levels, without proper hearing protection.

Source of Noise	Decibel Level
Swine in confinement at feeding	121-133
Swine barn nursery	66-69
Swine barn gestation	95-104
Hammermill	94
12 gauge shot gun	135-139
Chainsaw	115
John Deere 8560	76.5
Ventilation fan (Chore Time 18RLX)	77

Decibel Level	Max. Exposure (hours per day) without hearing protection
85	8
88	4
91	2
94	1
97	0.5
100	0.25
>100	0

Adapted from Centre for Agricultural Medicine, 1997, and SK Labour, Occupational Safety and Health Division

Always wear proper hearing protection when working in noise hazard areas. A short sudden squeal may cause hearing damage.



3. Air Quality – Dust and Gases

Pig barns can have an accumulation of dust and gases, thereby compromising air quality. Animals breathing, manure decomposition and burning of fossil fuels generates gases. Feed, manure, animals and bedding all contribute to dust production. The mixture and levels of these contaminants in the barn depends on the type and number of animals, the ventilation and heating systems, type of feed and feed handling system, type and frequency of manure cleanout, the time of year, and the overall cleanliness.

Up to 85% of dust in swine barns is fine particulate dust that can be inhaled into the lungs. 70-90% of barn dust is biologically active, meaning that our respiratory defense system will react (coughing, possible allergic reaction). It is recommended barn dust levels should not exceed 0.23mg/m³.



Prevalent Barn Gases

Gas	Characteristics	Source	TLV* (max)	Comments
Carbon dioxide (CO ₂)	Colourless and odourless	Animal respiration	5,000 ppm (8 hour day)	Non-toxic, but elevated levels will displace oxygen at floor level.
Carbon monoxide (CO)	Colourless, odourless, toxic, non-flammable	Fossil fuel burning (gas engines)	25 ppm (8 hour day)	Asphyxiant; toxic concentrations quickly absorbed; may cause illness in humans and pigs – small pigs and fetuses at greatest risk.
Ammonia (NH ₃)	Pungent, recognizable by acrid smell, and colourless	Bacteria that live in faeces and urine	25 ppm (8 hour day)	Most prevalent of all barn gases – irritates mucous membranes of eyes, nose, and upper respiratory tract; long periods of exposure may cause respiratory disease.
Methane (CH ₄)	Highly flammable, colourless, and odourless	Manure pits	5% max concentration in air	Highly explosive; simple asphyxiant, though rarely reaches danger threshold for oxygen deprivation
Hydrogen sulfide (H ₂ S)	Rotten egg smell at low concentrations; highly toxic, numbs smell at high concentrations; flammable at 4% concentration in air	Breakdown of manure in areas where there is no oxygen (silos, manure pits)	10 ppm at any time	Causes paralysis of olfactory system at 100 ppm; FATAL – 00 ppm can cause unconsciousness or death in 1-3 breaths

*TLV = threshold limit value, the airborne concentration of a substance to which an average person can be exposed repeatedly without any adverse effects.

There are a wide variety of respiratory protection devices available. Ensure only those that are approved by a recognized agency such as the National Institute for Occupational Safety and Health are used. Any respiratory protection device should only be used in accordance with its instructions. Gas and dust monitoring equipment are available. The barn should be kept well ventilated during manure transfer or agitation.

4. Animal Injection Safety

For many medicines and vaccines, injection is the best method of administration to an animal. If proper technique is not used an injection has the potential to do harm. Poorly injected products could not only create drug residues, scar tissue and/or abscesses but could also result in injury to the person administering the injection.

When preparing for administering injections:

- ☐ Training on proper injection should be provided by the herd veterinarian.
- ☐ Product information sheets should be reviewed.
- ☐ Needles should be disposed of safely when done.

Confined Spaces

A confined space is an enclosed or partially enclosed area, not designed for continuous human occupancy. Sometimes it becomes necessary to work in a confined space, such as inspection, cleaning, maintenance or repairs. Examples of confined spaces include manure pits, grain bins, water wells and tanker trailers. With manure pits, gases can be released spontaneously or when manure is pumped or agitated, and the concentration of these gases in the air can change very quickly.

Never enter a confined space unprotected, even to attempt a rescue.
Always call your local emergency response number (9-1-1).

If work in a confined space is necessary, then a confined space entry program should be drafted and reviewed by all employees. The program should include:

- ☐ Assigned responsibilities
- ☐ Inventory of all confined spaces on the farm property
- ☐ Hazard assessment for each confined space
- ☐ Written safe work procedures for entry into each confined space
- ☐ Entry permits if necessary
- ☐ Lockout and isolation of any hazardous material that could enter the space
- ☐ Lockout of any equipment that could pose a hazard
- ☐ Testing of the air within the space
- ☐ Cleaning, purging, or venting of the existing air in the space
- ☐ Ventilation before or during the entry
- ☐ Standby persons
- ☐ Rescue procedures and prior arrangements
- ☐ Lifelines, harnesses and lifting equipment
- ☐ Personal protective equipment
- ☐ Coordination of entry with other work activities in the vicinity

Response

Response steps to any personal safety emergency include the following:

- Call for help (yell for a coworker, phone 9-1-1)
- If possible, isolate or remove the threat of injury to another person (e.g. turn power off, turn on ventilation, sound an alarm, etc.).
- Have a First Aid kit handy for treatment of wounds, lacerations, etc.
- Read MSDS sheets if available for appropriate treatment procedures if applicable.

Resources

BC Pork Producers' Safety Guide (FARSHA): http://farsha.bc.ca/online_assets/category1_item222.pdf

WorkSafeBC: <http://www2.worksafebc.com/Portals/Agriculture/Home.asp>

Additional information in this binder

Secondary Contact Numbers (pages 7, 8)

WHMIS and MSDS sheets for this farm (page 65)

Spill Kits (Hazardous Materials) (page 37)

Equipment Maintenance Log (page 64)



In case of a personal safety emergency, our farm will:

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Summary

Although the goal of each livestock hauler is to get the animals to their destination safely and in a timely manner, risk factors do exist with each load transported. Drivers must not only make themselves aware of these risk factors, but they must also have a plan in place to deal with them if they should occur. By being prepared, the driver will be able to respond in an effective manner and lessen the impact of the delay on the animals and on themselves.

Each livestock move is different because there are many diverse animal transportation risk factors involved, some that can be controlled, and others that cannot:

- Fitness of individual animals on-board.
- Age and characteristics of the animal. (i.e. young piglets).
- Relocation history of the animals (lingering effects of a recent move).
- Distance of the planned journey.
- Environmental conditions.
- Detours and/or construction delays.
- Load configuration (weight & density).
- Equipment failure.
- Sudden and/or unexpected complications.

A combination of risk factors that go unchecked will increase the risk to animal welfare at some point in the journey. If the needs of the animals are not taken care of, the result may be injury or death to individual animals or a significant portion of the load.

Success of the move depends upon the ability and resourcefulness of the driver to identify risk factors, prepare for the possibility that they might occur, and have a plan in place to mitigate the risks prior to a situation becoming serious.

Preparation – the Emergency Plan

Each transporter should have an emergency plan in place. This plan should include:

- **Emergency contact sheet** with 24-hour phone numbers for dispatch, insurance companies, and veterinarian and dead stock services.
- **A list of resources** that would be required in the event of a livestock transport unit rollover (i.e. snow fence for containment, stock trailers, etc.) to be provided to first responders.
- Emergency response equipment including flares/traffic triangles, fire extinguisher and spill kits.
- Keep **paperwork** in an area of the cab where the first responders will be able to quickly locate them.



Response - Emergency Procedures

Delays

When dealing with delays in travel, keep the following points in mind:

- Avoid known delays by researching intended routes. Plan alternate routes if necessary. The well-being and safety of the animals must be considered at all times. It is the driver's responsibility to do his or her best to keep the animals comfortable and safe.
- During any delay, the driver must constantly monitor the comfort and condition of the animals.
- Animals must be protected from extreme weather conditions. In cold weather, when possible, the trailer should be parked in an area that provides protection from the wind. In high temperature conditions, when possible, the trailer should be parked in an area that provides shade and allows for a breeze to pass through the sides of the trailer.
- The driver should contact the origin and the destination contact person to inform them of the nature of the delay and determine the best plan of action.
- In the case of road construction, the driver should investigate if there are any alternate routes. If there is concern about the well-being of the animals, the driver should contact the local authorities and explain the animal situation in an attempt to gain permission to move through or receive assistance to turn around.
- If the delay is caused by bad weather or poor road conditions, the truck should be pulled over in a safe area, preferably where the animals will be protected from as much of the weather as possible. The driver should park the truck as far away from other traffic as possible to reduce the risk of other vehicles hitting the unit.
- In the case of a mechanical breakdown of the tractor, determine the nature of the breakdown and estimate how long the repairs will take. If the repairs cannot take place at the site of the breakdown or they will take an extended period of time, arrange for another tractor to be sent to take the trailer.

Accidents

By being prepared for an accident before it happens and understanding how to effectively respond to an incident involving livestock, the welfare and safety of the first responders, the handlers and the animals will improve dramatically.

Accidents involving loaded livestock units can be very serious, especially if injured and scared animals are accidentally released onto the roadway. Minor accidents can be treated much like delays.



The condition and welfare of the driver is the primary concern. If the driver is uninjured and physically able to do so:

- ❑ Call 911 if the accident occurs on a public roadway or if emergency assistance is required for an on-farm accident. Advise the operator of the location of the accident, the fact you have animals on-board, and the status of any loose livestock. Suggest that police and fire approach the scene with sirens off if possible.
- ❑ Set out emergency warning devices within 10 minutes of accident.
- ❑ Call the designated company contact. If the company has a dispatch checklist for accidents, proceed through list. If not, inform the dispatcher of the location of the accident, if there are any injuries, condition of animals, position of trailer, number of vehicles involved and if first responders are on scene yet.
- ❑ Call other designated contacts according to company protocol. These could include but are not limited to the insurance companies for the cargo and the vehicle and the destination, provide them with the same information.
- ❑ If the tractor and / or trailer are damaged and unable to move, proceed to the next point. If damage is minor, the trailer is upright and there are no injuries, take photos and record names and addresses of other people involved and witnesses.
- ❑ Herd any loose livestock from the road and gather them in an area as far away from traffic as possible.
- ❑ Locate accident reporting kit and camera. Take photos of accident as soon as possible. Photographs should include photos of road conditions, vehicle damage, trailer position, the overall accident scene, skid marks, curves, intersections and where the vehicle left the road (if it did).
- ❑ Provide as much protection and comfort for the animals as possible.
- ❑ Release statements only to persons of authority (i.e. police, fire). Do not talk to media or bystanders about the accident or the load you are transporting.
- ❑ When first responders (fire / police / ambulance) arrive on the scene brief them on the following accident details: Any human injuries, Type of animals, Number of animals, Status of any loose animals and known hazards.
- ❑ Respect the accident scene chain of command - assist if needed.

(Adapted from Canadian Livestock Transport Program)

Resources

Canadian Livestock Transport Certification Program: <http://www.livestocktransport.ca/en/>

Additional information in this binder

Secondary Contact Numbers (page 7, 8)

In case of an emergency during live transport, our farm will:

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DO NOT:

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Summary

A wide range of emergencies can affect livestock in British Columbia, and trigger consideration of disposal of animal carcasses and associated tissues. Flooding, wildfires, severe weather, animal disease outbreaks, among other events, may challenge individual agriculture producers, local governments, and provincial and federal senior government agencies with legal jurisdiction to rapidly develop plans for disposal.

Where disease outbreaks occur, specific pathogens may pose an infectious risk to other animals or humans. Preventing the spread of infectious animal diseases, through prompt treatment and burial of contaminated material, eliminates the threat to susceptible animals. Burial on farms or at one or more central burial sites represents an effective way of enhancing public safety, protecting the environment, and promoting agricultural recovery.

Emergency burial may not be a suitable option in all locations in BC. In fact, burial requires specific site conditions to ensure adequate environmental and human health (drinking water) protection and bio-secure containment of disease agents. Emergency burial of significant carcass volumes is not an appropriate emergency disposal option for the Lower Mainland, the flood plains of Southern Vancouver Island, or some areas of the Okanagan due to various combinations of high water table, high rainfall, unsuitable soils, and dense human populations. For other areas, the suitability of burial as a disposal option will depend on specific conditions determined in a site assessment. Contact the Ministry of Agriculture for more information on site assessments.

The most viable option for pork producers is rendering. As most registered BC producers currently use rendering as their mortality management plan, it would be easiest to increase the amount of dead stock pick-up by the rendering company.

Note: Rendering may not be an option in some cases, such as with certain animal diseases, if the carcasses are not “fresh” which could occur during a flood or other events. A flow chart identifying best options for different scenarios can be found later in this section.

Before initiating any carcass disposal activity when responding to mass mortality from any type of event, be sure to confirm and secure all relevant authorization or compliance requirements with the appropriate agencies.

Preparation

My preparedness steps for mass mortality include the following:

- Develop a plan for dealing with mass mortality.
- If the mass mortality plan is burial, compost or incineration, identify the appropriate locations for these activities to take place. Secure any necessary permitting.

Response

Response steps for mass mortality include the following:

- Review your mass mortality plan with BC Ministry of Agriculture and BC Ministry of Environment if it includes compost or burial to ensure siting is appropriate. Secure any necessary permitting.
- Ensure mass mortality disposal is carried out in a bio-secure manner that does not contaminate the environment.

Resources

BC Environmental Farm Plan Program Contingency Plan:

<https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/programs/environmental-farm-plan>

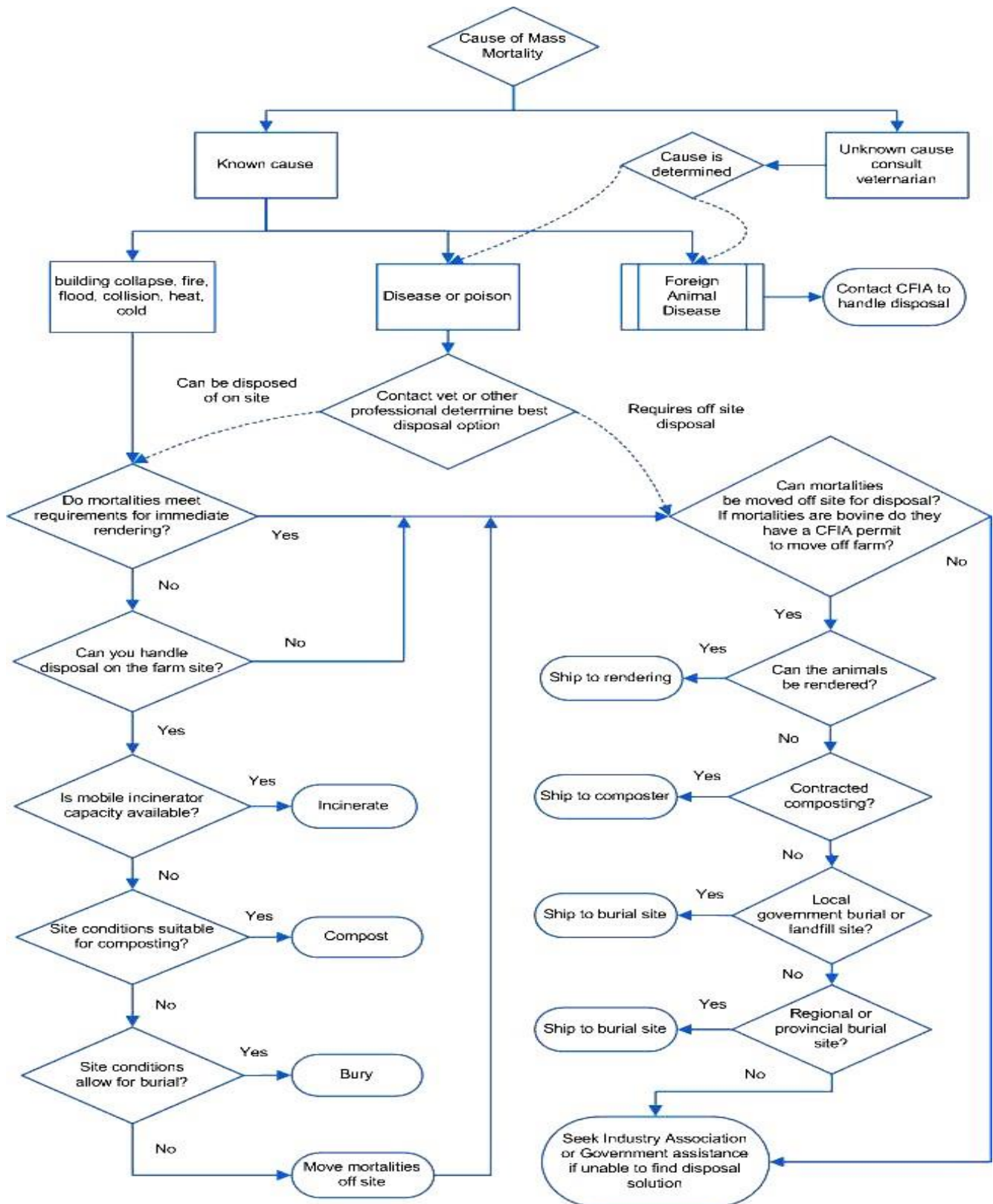
BC Ministry of Agriculture “Protocol #1 – Protocol for On-Farm and Centralized Burial of Infected and Non-Infected Poultry and Livestock”: https://www2.gov.bc.ca/assets/gov/farming-natural-resources-and-industry/agriculture-and-seafood/farm-management/structures-and-mechanization/300-series/384300-5_protocol_1_on-farm_and_centralized_burial.pdf

Additional information in this binder:

Secondary Contact Numbers (page 7, 8)

Equipment Maintenance Log (page 64)

Mass Mortality Carcass Disposal Options



In case of mass mortality during an emergency, our farm will:

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DO NOT:

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This Guide complements other emergency guides, reports, and documents that may be of interest. Some of the more useful resources may be accessed through the websites listed in this section.

Agriculture and Agri-Food Canada Programs

<http://www.agr.gc.ca/eng/programs-and-services/?id=1362675650980>

BC Growing Forward 2 Programs

<https://www.bcfpa.ca/growing-forward-2-province-bc-government-canada/E53664C7289317829FA25360E>

BC Hydro Power Outages Map

https://www.bchydro.com/outages/orsMapView.jsp?WT.ac=hp_mh_outmap

BC Ministry of Agriculture, Livestock Evacuation, Emergency Management Planning Tools

https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/business-market-development/emergency-management/livestock-relocation_acuation.htm

BC Ministry of Environment – Drought Information

<https://www2.gov.bc.ca/gov/content/environment/air-land-water/water/drought-flooding-dikes-dams/drought-information>

BC Pork Producers' Association BC Swine Herd Health Emergency Response Plan

www.bcpork.ca/

Canadian Livestock Transport Certification Program

<http://www.livestocktransport.ca/en/>

Canadian Quality Assurance (CQA) Program

<http://https://www.cpc-ccp.com/cqa>

Canadian Swine Health Board

<https://www.cpc-ccp.com/swine-health>

CFIA Reportable Diseases

<http://www.inspection.gc.ca/animals/terrestrial-animals/diseases/reportable/eng/1303768471142/1303768544412>

Current Wildfire Situation

<https://www2.gov.bc.ca/gov/content/safety/wildfire-status>

DataBC

www.data.gov.bc.ca/

Emergency Management BC

<http://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery>

Emergency Management BC, Disaster Financial Assistance Program

<https://www2.gov.bc.ca/gov/content/safety/emergency-preparedness-response-recovery/emergency-response-and-recovery/disaster-financial-assistance>

Environmental Farm Plan Program

<https://ardcorp.ca/programs/environmental-farm-plan/l-farm-plan-program>

FARSHA Pork Producers' Safety Guide

http://farsha.bc.ca/online_assets/category1_item222.pdf

AgSafe Safety Materials

<http://agsafebc.ca/>

FireSmart Manual

www.bcwildfire.ca/Prevention/firesmart.htm

Flood Preparedness

<https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/business-market-development/emergency-management/freshet-and-flood>

Fortis BC Power Outage

<http://fortisbc.com/Safety/EmergencyPreparedness/Pages/Power-outages.aspx>

Google Earth

www.google.com/earth/

Insurance Bureau of Canada

www.ibc.ca/

On-Farm Contingency Plan

<http://www.agf.gov.bc.ca/resmgmt/EnviroFarmPlannin>
https://www.bcac.bc.ca/sites/bcac.localhost/files/Ardcorp_Program_Documents/EFP/Contingency%20Plan%20-%20Template%20for%20On%20Farm%20Planning.pdf

Premises ID

<https://www2.gov.bc.ca/gov/content/industry/agriculture-seafood/programs/premises-id>

WorkSafe BC

<http://www2.worksafebc.com/Portals/Agriculture/Home.aspx>

Wildfire Service

<https://www2.gov.bc.ca/gov/content/safety/wildfire-status>

Wildfire Information

[1-888-3FOREST \(1-888-336-7378\)](https://www2.gov.bc.ca/gov/content/safety/wildfire-status)

FARM EMPLOYEE TRAINING LOG

[illegible]

EQUIPMENT MAINTENANCE LOG

[illegible]