

AgriKids Farm Safety Ambassador

Theme 1: Farm yard, Field & Electricity Safety

Level: 3rd- 4th Class

Objective:

Learn about the specific hazards on a working farm and how to recognise the various safety signs used. We will also take a look at the working at heights and how farmers can carry out this work safely.



Learning outcome topics

1. Visiting a farm safely & the signs.
2. Keeping our yard tidy
3. Where the dangers might be – Farm yard zones
4. Working at heights
5. What is electricity made of and how is electricity used on a farm?

The Topics













1. Preparing your farm visit checklist.

This is designed to be a full class discussion to empower this age group to share their ideas and thoughts on farm safety. Before visiting a farm, outline what the children 'Need to Know, Before they Go!'

Invite two children to be our **farm safety officers** who write up each answers to the following questions. The rest of the class can follow along in their workbooks. The questions will serve to remind the children about the many dangers on a farm and being respectful of the place of work they may be visiting.

- a. Who are you going with?
 - i. It's important to reinforce the message 'We never visit a farm alone or without permission'. These are older children so they may feel it is ok for them to go unaccompanied.
 - ii. Ask them why they should not visit a farm without permission?
 - iii. Make sure they check with the farmer before going.
- b. What kind of farm are you visiting?
 - i. Speak about the different kinds of farms there are.
 - ii. What will you see on these farms?
 - iii. What kind of dangers might there be on the farm you are visiting?
Animals / Machinery / Chemicals
- c. Are there big jobs planned on the farm that day?
 - i. What kind of big jobs might be on a typical farm (bringing in silage, moving animals, mixing slurry)
 - ii. Ask the children why we don't visit a farm during busy times
- d. What will you wear?
 - i. Your boots (not roller skates, or high heels, or hee-lies!!)
 - ii. A coat if it is cold or rainy
 - iii. A hi vis vest
- e. What kind of warning signs you will see?

See if children are aware of the various signs they may see while on the farm. If not you may need to remind them by leading conversation to the 'Know the signs' chart below.

| Signs – Know your colours & Shapes | | | | |
|---|--------------------------------------|----------------------------|---|---|
| Shape | Meaning | Colour | Example | Hand signal |
|  Circle with a diagonal bar | Prohibition (no, stop, do not go) | Red (White contrast) |  Children do not cross |  |
|  Blue circle | Mandatory (You must, you have to) | Blue (White contrast) |  Wear eye protection |  |
|  Triangle | Caution / Warning | YELLOW (Black contrast) |  Danger - Flammable |  |
|  Square / Rectangle | Safe area or condition | Green (White contrast) |  Safe area to assemble |  |

2. Keeping the yard tidy and avoiding trip hazards

Keeping the yard tidy can help the farmer in many ways, eg.

- Easily locate items when needed
- Helps prevent trips and falls from items left lying around
- Is a better way to maximise space when tools and equipment is kept tidy
- Forks left on the ground could easily be trod on by a person or animal.

What are some easy ways the farmer can keep their yard tidy?

- Prevent tripping by picking up hand tools such as brushes, shovels and forks.
- Baling twine once removed should be stored off the ground
- Clear slippery areas by cleaning up oil spills & killing off algae in damper areas.
- Make sure all gates are properly hung and sturdy
- If tyres are left against a wall, they should never be climbed on as they will fall forward.
- All tools are put away after use
- All chemicals are stored away
- Bales are stacked safely (no wobbly ones)
- Ladders are not left lying against the wall
- Signs are put up to warn people



Can the children think of anymore ways to keep the yard tidy. What measures could be taken in school or at home to prevent people from tripping or falling?

- Not rushing about
- Tidying away toys
- Keeping the floor clutter free
- Making sure items on shelves are stacked safely
-

3. The Farm Zones

On a blackboard list the following ‘Farm Yard ‘Zones’.

- Sheds
- Animal Pens
- Fields

Now ask the children to mention some of the dangers they might find in each zone. The prompts below will help with your discussion. Finish off by familiarising the children with the safety signs used in each area.

| The Farm Yard Zones | Safety | What signs? |
|---|---|---|
| <p>The Sheds: What are the different types of shed?</p> <p>Sheds and outbuildings are very important on a farm. They house and protect many aspects and outputs of the farm. We will cover off chemical storage in Theme 4 so here are other types of shed on a farm:</p> <ul style="list-style-type: none"> • Grain storage • Hay and straw bales • Animal pens • Machinery storage • Machinery repairs • Animal feedstuffs  | <p>The Dangers:</p> <ul style="list-style-type: none"> • Falling from bales • Falling through a roof • Items falling from overhead • Fire <p><u>Falling:</u> Bales, pallets and tyres are often very wobbly and can easily fall.</p> <p>A falling bale or tractor tyre can weigh as much as several grown adults.</p> <p>Extra care must also be taken when fixing rooves – they may not be able to support an adult’s weight. Using a hydraulic crane will protect farmers from falling through rooves during repair work.</p> <p><u>Fires:</u> Most hay fires occur within the first six weeks after baling.</p> <p>Moisture content is the main factor that causes hay and straw to spontaneously combust. Farmer must be sure not to bale or stack hay that is moist. They can use monitors like the one pictured on right to check moisture levels in their hay and straw.</p> <p>Hay fires are more common than straw fires</p> <p>Staying Safe: So stay away from ladders and bales, pallets, tyres or anything else that you might find piled up on the farm. Never try to play on old swings – the ropes may be rotted and dangerous.</p> <p>Farmers should make sure that ladders are tidied away and not causing any unnecessary temptation.</p> | <p>The signs:</p>   |

Farmers should remove old rope and tyre swings from their farm sheds

Beware of any moving machinery or machinery parts in a shed, such as a PTO which can cause entanglement.



The Animal Pen

What animals may be in the pen?

Many farmers will keep animals indoors at different times of the year. In spring time many sheep and cattle are indoors as they prepare to give birth.

Typical animals housed indoors are:

- Cattle
- Horses
- Sheep
- Pigs
- Chickens
- Bulls



The Dangers:

Animals & Young:

Birthing time is a very stressful time for the animals and farmers have to be extremely careful around those animals who are likely to attack while protecting their young.

Did you know: Freshly calved cows can cause more accidents on farms than a bull!

Medicines:

Some animals may require some medicines, never touch any bottle that you may see in a shed. Always tell an adult if you see any that may be there by accident. We will cover more on toxic substances in Theme 4.

Bulls:

Bulls are very territorial creatures, this means they protect their pen or their field and don't like anyone getting too close.

Staying Safe:

Keep back from animals and their young especially in the early days since birth.

Never enter a pen or field with a bull!

Wash your hands every time you are touch an animal. Zoonosis is the spreading of disease from an animal to a person, handwashing can prevent the spread.

Farms set up footbaths to disinfect shoes and boots which prevent diseases spreading amongst groups of animals.

The signs:



Dipping boots to prevent diseases spreading

The Farm Yard Zones

Safety

What signs?

The Fields

What are the fields used for?

On a farm the farmer has many uses for their land!

- Feeding animals
- Growing crops for humans
- Growing animal feeds
- Growing animal bedding
- Orchards for fruit growing

They also add to the scenery and sometimes you can be lucky to be able to enjoy a picnic or a walk – but always make sure you have permission!

The Dangers:

Animals:

Never enter fields where there are animals and their young.

Bulls are extremely dangerous and should be avoided at all times.

Electricity:

Can you recognise electric fences by their wires, and the subtle clicking sound? Never touch an electric fence!

There could be a very strong current passing through. If you see someone touching an electric fence and getting a shock, don't try to

The signs:



Never leave a gate open after going into a field. The rule of gates is that if it was open when you got to it, leave it open. If it was closed when you got to it, close it behind you.

It is never safe to climb over fences, or to go into fenced off areas. They are fenced off for a reason!

pull them away, because you too will get a shock.

Water:

Ditches, drains, water troughs, ponds, rivers or streams may be present in the field. Do not approach in case you slip and fall.

On the farm uncovered holes can easily fill with water if not covered in as well as water barrels, animal drinkers, etc can be a danger.

Stay Safe:

- Look out for signs that warn you of any dangers.
- Stay out of fields that have a bull or cows with young calves grazing.
- Never enter a field that is not your property, this is trespassing.
- Be careful of the fencing such as barbed wire and electric wire on their fences – you could get cut or get a nasty shock!
- If you open a gate, always close it after you!



4. Working at heights

Causes of falls

The main causes of a fall on a farm are:

- Bales of hay
- Bad use of ladders
- Roof repairs
- Untidy yard

Bales

Falling from stacks or loads is the biggest cause of injuries from bales.

Farmers can help prevent this by making sure their stacks are built secure and binding stacks and loads. Also ensuring children are not permitted to climb.

When removing bales, farmers must do so from the top first. Removing bales lower down the stack will leave bales unsupported, which could tumble and fall. (think of Jenga!!)



Ladders

Ladders should NEVER be used by children!

Did you know that many farmers are injured when ladders they are using slip sideways or away from the wall.

Using a platform on a telescopic handler is much quicker and safer, in fact ladders should only be used as the last resort when there is no safer way of doing the job.

Tips for farmers when using a ladder:

- Make sure the ladder is secure
- The base of the ladder must always be placed on firm, level and secure ground.
- The ladder needs to be 'footed' or 'tied off' securely to prevent it slipping.
- Ladders must be in good condition. Makeshift, home-made or damaged ladders are dangerous and should
- never be used.
- Never carry heavy objects while climbing a ladder
- Never reach out sideways from a ladder as this could cause the ladder to wobble and possibly turn over.

Scce: hsa.ie and HSENI.gov.uk



Roof repairs

In agriculture, many serious injuries occur from falls involving work on fragile roofs. These are roofs sheeted with materials that will not safely support a person's weight and can shatter without warning. Fragile roofing materials include galvanised and Perspex sheeting.



5. Electricity Safety on a farm

What is electricity?

Start by asking the children what they might already know about electricity and then create list of what is electrical in the class room and how they know it is electrical.

Electricity is a kind of energy that can give things the ability to move and work.

Eg. A TV, a hair dryer, lights, vacuum cleaners. All things with a plug use electricity to work.

Where and how would a farmer use electricity on their farm?

- Lights in sheds
- Electric fences
- Clippers to clip sheep's wool
- Heated lambs to keep new born animals warm.
- A dairy parlour



Electric Fences

Can you recognise electric fences by their wires, and the subtle clicking sound?

Never touch an electric fence, you could get a terrible shock.

Pics: Vet South & Martin Pot

<http://martybugs.net>



Staying safe

Electrical cables on telegraph poles can be dangerous. Avoid playing with kites near overhead cables, and avoid using fishing rods near overhead cables.

If there is a broken cable on the ground, never approach it and call the electricity company immediately.



Farmers must be careful not to come into contact with overhead wires when using machinery such as loaders and combine harvesters. (see graphic below)

KEY FARM SAFETY MESSAGES from ESB NETWORKS (ESBNetworks.ie)

1. Watch out for overhead electricity wires
2. Steer clear of electricity poles
3. Electricity wires are always live
4. Never touch fallen wires.
5. Never handle stock that may be in contact with electricity wires.
6. Display safety stickers on farm machinery to remind everyone to be "electricity safe".
7. In an emergency, phone immediately 1800 372 999



OVERHEAD WIRES

Farmers must be careful not to come in contact with overhead wires. If they do they must follow these steps:

- 1. Stay inside the cab. Never touch the machine & ground at the same time.**
- 2. Get help! Call ESB Networks 1850 372 999.**
- 3. If in danger, jump clear and stay clear. Land on your feet & don't touch the ground. Do not go back into the vehicle, it could still be live.**

Source: ESB Networks 'Farm Safety with Electricity'

Follow up activities & projects

- Complete the activities in the farm safety workbook
- Build your own model farm and show how to stay safe in the different zones – eg. put up signs.
- Try the Lesson Plan for this Theme.
- Check out our white board and PC games: Farm Yard Safety, Off to Work and Follow the Signs on agrikids.ie
- Download and fill in our 'Spot the Dangers' worksheets.
- Colour and cut out the Farm Safety Signs and hang them in your classroom
- Create a farm safety mural in your school hall for everyone to see
- Test the theory of wobbly bales with a game of Jenga.
- Sign up for an AgriKids webinar
- Invite a farmer to your class and ask them how they stay safe on their farm
- Ask a member of ESB Networks to your class to talk about electricity safety
- Ask a fire safety officer to talk to the children about fire safety
- Check out the electricity experiments on - <https://www.weareteachers.com/electricity-experiments/>