You Need to Become a Better Observer
STEER VISION DIAGRAM

Cattle have panoramic vision, as shown in this drawing. The area covered by the coarse concentric circles represents the animal’s field of vision in which it has no depth perception. The small shaded area in front of the animal’s head represents its binocular field. It has depth perception in this 25 to 50 degree area.
Calm Animals Are Easier to Handle
Signs of Fearful Stressed Animals

- Eye white in cattle
- Vocalization during handling in cattle and pigs – Do not use in sheep
- Tail switching on cattle
- Pooping in cattle
Distractions That Cause Balking and Refusal to Move

- Shadows and high contrasts of light and dark
- Reflections on metal or water
- Seeing people up ahead
- Moving objects
- Air blowing in their faces
- Coat hung on fence
Distractions That Cause Balking

1. Objects lying on the ground
2. Drain grates
3. Changes in flooring type
4. Dripping water
5. Dangling chains
6. Turning fan blades
Use Scoring to Show How Changes Made in Your Operation Improved Handling

Effect of Air Blowing into the Faces of Cattle at the Restrainer Entrance on Vocalization Score

<table>
<thead>
<tr>
<th>% Cattle Vocalizing Due to Balking &amp; Increased Electric Prod Use</th>
<th>Air Blowing Out Through Restrainer Entrance Towards Approaching Cattle</th>
<th>No Air Movement Towards the Cattle</th>
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<td>4.5</td>
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Get down in the chute and see what the approaching animals are seeing
Do you see anything in this photo?
A calm animal will look at the distraction
Shadows and Light Streaks May Cause Baulking

Watch for Time of Day Effects
Animals Stop Where Flooring Has White Strip
A solid side should be installed to prevent the cattle from seeing the man.
Herding animal’s behavior is controlled by vision

An opaque curtain will contain them
Entire Gate Rubber Curtain
Animals are spooked by distractions outside this pen.
Cattle movement improved after solid sides were installed. Outer perimeters most important to cover.
Reflections on the floor make animals balk.
What Do You See In This Picture?
Animals will enter a restrainer more easily if the entrance is lighted.
Electric Prod Use on Pigs Was Reduced By Adding Lighting at the Restrainer Entrance

All handlers were well trained and only pigs that balked or backed up were prodded.
Experiment to Reduce Balking
Use These Simple Tools

- A portable electric light on a long cord
- Lots of cardboard
- Duct tape and other things to fasten cardboard
Barrier prevents animal from seeing people and moving equipment.
Animals Move Towards the Light
An animal may refuse to place its head into this dark head opening.
Cow’s eye view into a squeeze chute with louvre sides

Lighted head opening attracts the animals, but no people are visible through the sides
Do Vertical Gates Provide Sufficient Back Clearance?
Tall Steers Get Back Bruises on Trucks

Credit: Helen Kline
Race Outside Entrance
May Appear Too Dark
Dark Movie Theater Effect
Problem on Sunny Days
Electric Prod is Never the Main Driving Aid

Get it out of your hands. Only use on an occasional stubborn animal.
Driving Aids for Pigs

Source: Animalhandling.org
Use a flag to move livestock
A flag can be used to turn an animal by blocking the animal’s vision on one side
Paddle stick and small flag for moving animals
Witch’s Cape for Moving Pigs
When Does Tapping Become Beating? Be Careful

Beating is an Egregious Act of Abuse
Never Do Acts of Abuse

- Never drag conscious animals
- Never poke sensitive areas
- Never deliberately slam gates on an animal
- Never deliberately drive animals over a downer
- Never beat animals
Never Drag or Knock Over Animals with Powered Gates
Natural Livestock
Behaviors For All Species

- Flight Zone – Animals move away
- Pressure Zone – Animals turn and face a person
- Point of Balance
- Natural Following Behavior – Learn to time small bunches of cattle and pigs
- Go back to where they came from
Calm animals will have a smaller flight zone

and

Tame animals will have no flight zone
Handlers should learn the principle of pressure and release on the flight zone.
Point of Balance Principles

- It is at the shoulder when the handler is close to cattle in chutes.
- It is usually just past the eye when the handler is further away.
- To make an animal move forward, the handler must be behind the point of balance.
If an animal rears, back up and get out of its flight zone.
Handler Movement Pattern to Keep Cattle Moving Into a Squeeze Chute or Restrainer

Return path leaving flight zone.

Path to move animals forward.

Cattle will move forward when the handler passes the point of balance at the shoulder of each animal. The handler walks in the opposite direction along side the single file race.
Handler Movement Pattern to Keep Cattle Moving Into the Squeeze Chute in a Curved Chute System

Cattle will move forward when handler crosses the point of balance of each animal.
Cattle and pigs should be moved in small groups.

Sheep can be moved in larger groups.
The crowd pen should be filled half full with cattle or pigs
Crowd gate used correctly and the animals have room to turn.
Sheep Handling is a Continuous Flow
Use Following Behavior
Non-Slip Flooring is Essential

- Animals get agitated when they slip
- Scales and unloading ramps
Non-Slip Grating
Built From Rock
Concrete Non-Slip Floor
Correctly Stocked Pen and Cattle Resting

Credit: Helen Kline
Overstocked Cattle cannot rest

Credit: Helen Kline
Animal Avoids Walking on the Reflection
Avoid This Bad Design Mistake

The wrong cleat spacing will cause animals to slip and fall
Right

Foot fits between cleats
Wrong

Foot on top of cleats
Wrong

Foot slips between cleats
Cattle and Sheep

The correct layout of the crowd pen entrance angle
WRONG LAYOUT: Animals will jam together and not move through the system if the angle is too gradual. This design mistake applied to the building of crowd pens for all livestock species.
Pigs Right – Offset step prevents jamming. Pigs will jam a funnel
Easy-to-Use Lameness Scoring for Groups of Animals Unloading at an Abattoir

1. Normal
2. Obvious limp - Keeps up with walking group
3. Obvious limp – Lags behind walking group
4. Almost a downer

Grandin, 2015
NAMI 2015
Edwards et al., 2017
Animal Handling Problems
Must Correct at Farm

- Lame animals
- Animals fed too much beta-agonist
- Crazy pigs because the farmer never walked the pens
- Dogs make cattle kick
- High flight zone cattle handled only on horseback or allowed to go feral
Basic Curved Cattle or Sheep Layout
Restricted Space Layout

Solid Side

Open side

Solid side

Squeeze chute head restraint

12 ft. (3.5 m)

48 ft. (14 m)

24 ft. (7 m)
Small Locker Plant Layout

KILL BOX
RAISED CONCRETE PLATFORM
SLIDE GATE
PIG HOLDING PEN
CROWD PEN
24" (609) WIDE HANDLER CATWALK 42" (1066) DOWN FROM TOP OF 60" (1524) HIGH SOLID FENCE
DRIVE-THROUGH STOCK TRAILER CHUTE

WATER

11'-10" (3607)
10' (3048)
12'-6" (3810)
6' (1829)
6' (1829)
10' (3048)
12'-6" (3810)

32" (813) WIDE SINGLE-FILE CHUTE
1 1/2" (445) TOTAL RISE TO BASE OF KILL BOX
3 1/2" (89) HIGH
1 1/2" (457) WIDE STEPS

INSIDE MEAT PLANT

0 5' 10'
(1524)
(3048)
(1524)

DRAWING SCALE
UNLESS OTHERWISE SPECIFIED
All dimensions in feet and inches with millimeters in parentheses

DEEP-GROOVE CONCRETE
IN ALL AREAS ANIMALS WALK
USE 8" (203) DIAMOND-PATTE CROOVES 1 1/2" (38) DEEP AND 1 1/2" (38) WIDE
Small Plant Layout
Small Animal Restrainer for Kosher or Halal Slaughter

www.Spiritofhumane.com
www.sheepandgoat.com
Never use insulation with soft plastic surface. Birds and rodents destroy it.
Books by Temple Grandin

Improving Animal Welfare: A Practical Approach
Humane Livestock Handling
Thinking in Pictures
Animals in Translation
Animals Make Us Human
The Autistic Brain
Genetics and Behavior of Domestic Animals
Livestock Handling and Transport
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