



Fokus Farestald + ERFA 35

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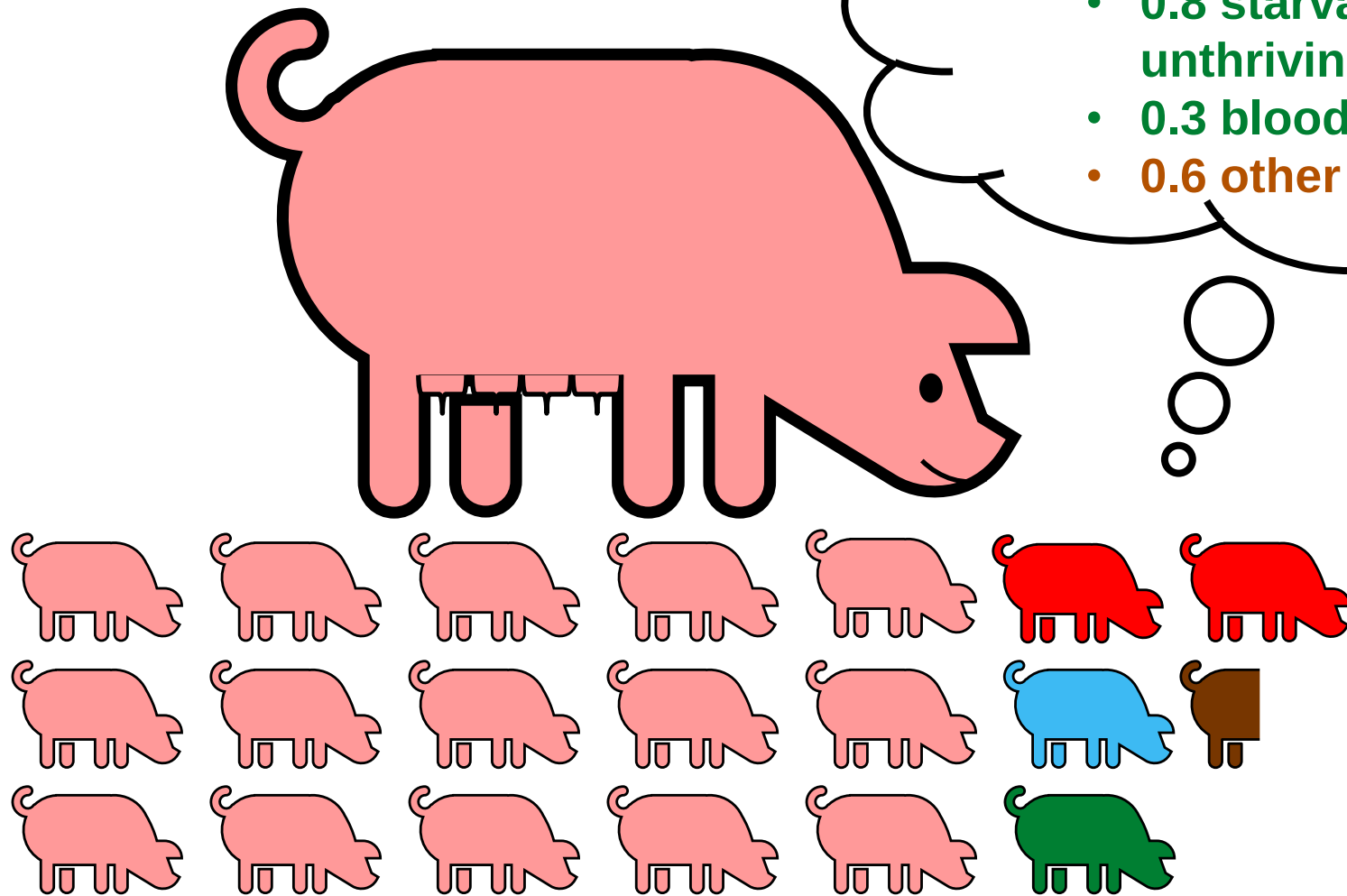
Kjellerup den 18. maj 2022

STØTTET AF

Svineafgiftsfonden

SEGES
INNOVATION

Average in DK: 19.6 piglets per litter



- 1.9 stillborn
- 1.0 crushed
- 0.8 starvation, weak, unthriving
- 0.3 blood poisoning
- 0.6 other

Before parturition



A sow fit for farrowing

- 5-7 days before expected farrowing
 - The sow get used to the pen
 - Legstration: min. 3 days before farrowing
- 14-17 mm backfat
 - To fat sows? problems with farrowing, depress feed intake
 - To skinny sows? no energy for milk, impair on reproduction
- 3.4-4.1 FE/day
 - At least three meals a day (equally distributed around the clock)
 - The sow have energy to perform at farrowing (Marathon)
 - 500-600 gram fibre/day
 - Fibre gives the sow energy for many hours



Nest building

Reduces farrowing length
and stillborn piglets

Improves nursing
performance

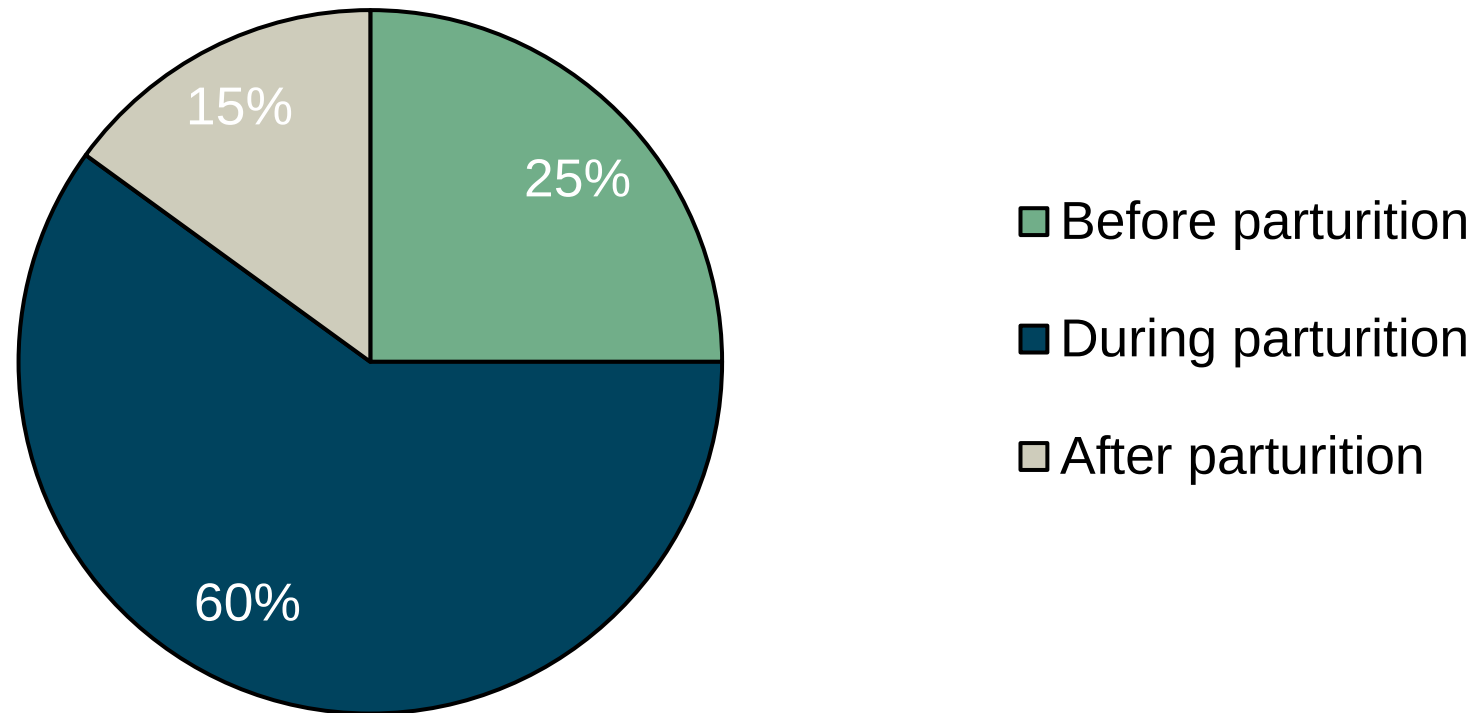


A close-up photograph of a pig in the process of giving birth. The pig is lying on a dark metal grate floor. Its hindquarters are visible, with a large, bloody, and fleshy birth canal open. A small, pink, wet piglet is lying on the grate just below the birth canal. The pig's skin is light pink and appears slightly irritated or red around the birth area. A blue-handled metal rod is visible on the left side of the frame, and a dark metal rod is visible on the right side. The word "Farrowing" is written in white text on the left side of the image.

Farrowing

1.9 stillborn piglets - 1.1 piglets die during farrowing = Potential

7



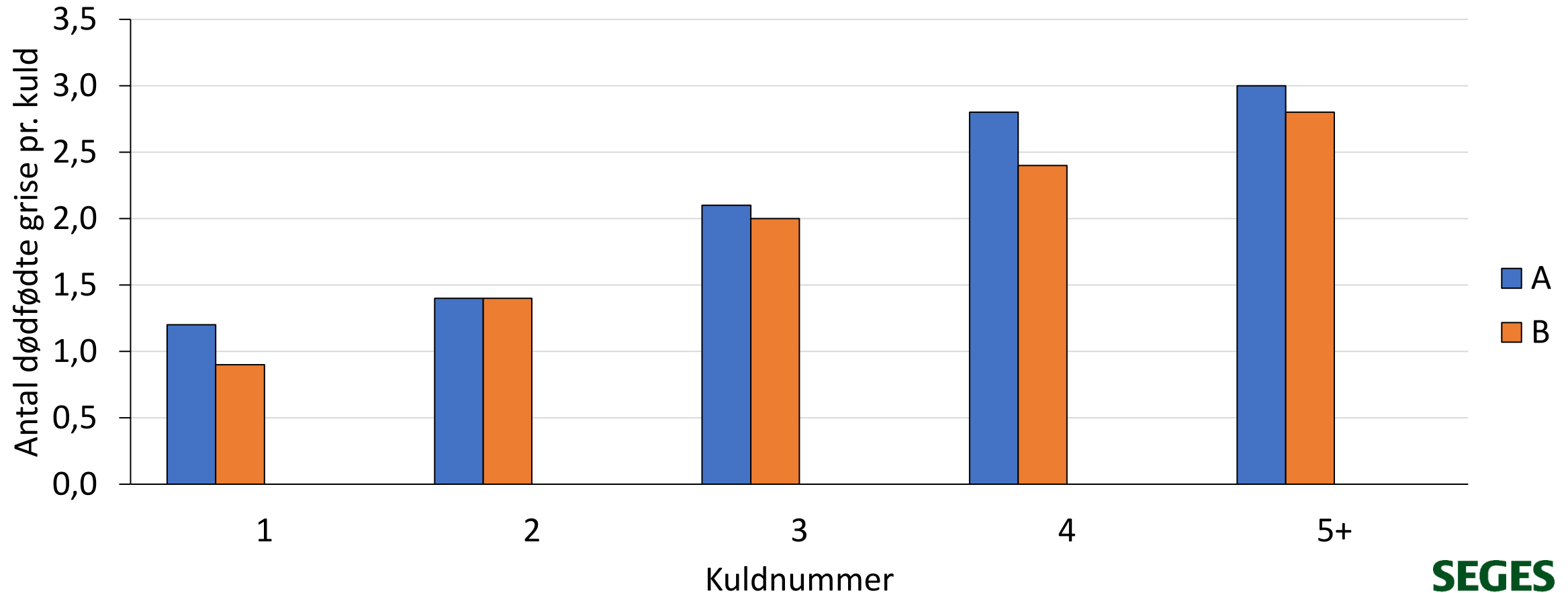
Good to know about the farrowing



- Sows want to farrow in peace
→ most sows start to farrow after working hours
- On avg. the farrowing takes 6 h (1.5 - 14.5 h)
 - Risk of stillbirth increases with increasing farrowing duration
 - Risk of stillbirth increases with increasing birth order
- For every parity, the number of stillborn increases by $\frac{1}{2}$ piglet

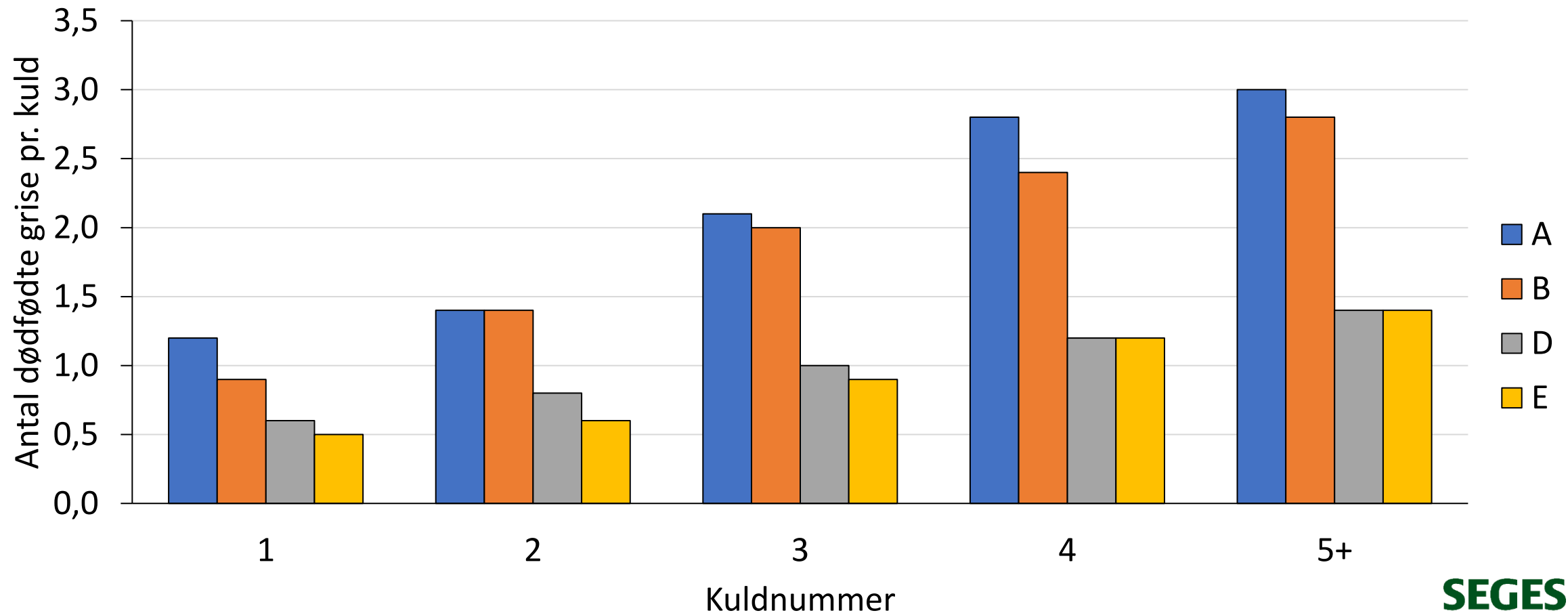
How many stillborn per liter do you have at your farm?

For every parity the sow get +0.5 stillborn piglet



Igangværende afprøvning 1717

Farms with 24-hours surveillance get only 1 stillborn per litter



Igangværende afprøvning 1717

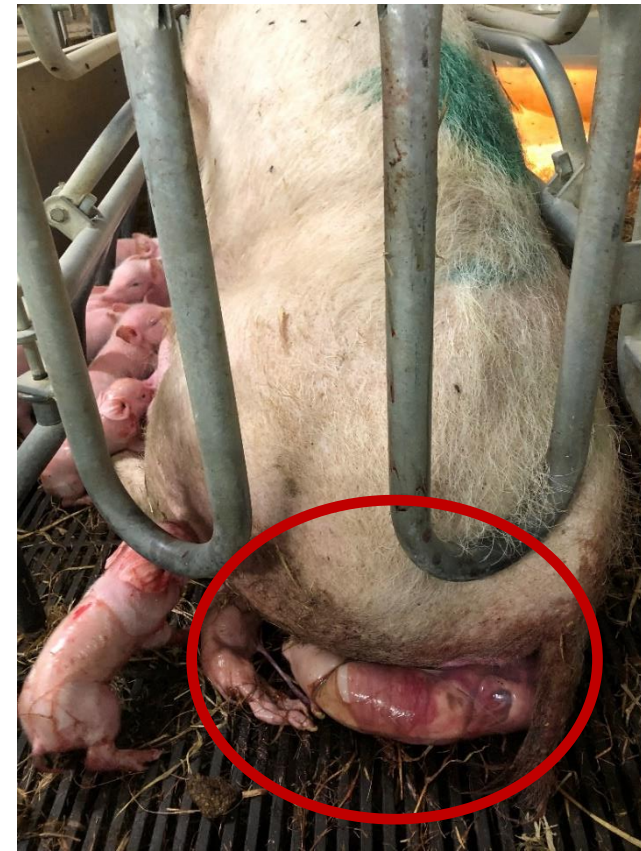
Organize farrowing surveillance and assistance

- When farrowing is in progress → Farrowing surveillance
- Put one person in charge
- Set an alarm for every 30 min
- Supervise all farrowing sows
- Count piglets and note the number
- No new piglets since last check = assistance
 - Piglet 1-3: 1 h between piglets
 - Piglet >3: 30 min between piglets



Extra benefits from surveillance

- Help piglets to the udder or into the heat/creep
- Mark the first-born piglets
 - Ready to be moved early
- Help newborn piglets out of the amniotic sac



Tools for managing farrowing surveillance

Date: 3/9

Time	Number	Help	Number	Score
00.00				
00.30				
01.00				
01.30				
02.00				
02.30				
03.00				
03.30				
04.00				
04.30	21-2			
05.00				
05.30	2-0			
06.00	10-0			
06.30				
07.00				
07.30				
08.00				
08.30				
09.00	2-0			
09.30	10-0			
10.00				
10.30				
11.00	14-0			
11.30	15-0			
12.00	13-1			
12.30	13-1			
13.00	20-1			
13.30	24-2			
14.00				
14.30				
15.00				
15.30				
16.00				
16.30				
17.00				
17.30				
18.00				
18.30				
19.00				
19.30				
20.00				
20.30				
21.00				
21.30				
22.00				
22.30				
23.00				

7268 1351 13

Labning	Dato	Orn	Medarbejder	Semen collection ID	Dato	Levende fodde	Dødfodde	Sten fodde	Sogrise	Dato	Ant
1	12-05-18		d	tvang	04-09-18	19	1			30-09-18	14
2	09-10-18	p	tvang		01-02-19	18	3			05-10-18	14
3	12-05-19	d			06-07-19	24				08-03-19	13
4	13-08-19	p	tvang							27-07-19	14
5	14-01-20	o								09-08-19	14
6	15-06-20	d								10-01-20	14

15/10/15/12/18/3

15.10.
27/10
12/4
10-4L-12-0H
13-8L-1P
14-10L-2D
15-12L
16-13L-5L-4d-1bed
Far



Annüller



F-Skiven
Produktivitet

ÅBN

Opret faring i Stald 1

Dato: 25/06-2015
Tidspunkt: 11:04

146

23365

Levende fodde

Dødfodde

16

02

17

03

18

04

19

05

20

06

Fødselsbælg
Måske færdig
Færdig

✓

✓

Gem & Ny

Gem & Luk

Åbn

Stald 1

St Nr. 142 - So 10562

St Nr. 146 - So 23365

Tilføjr Alarm til Stald 1

Alarm om 30 minutter

Alarm om 45 minutter

Antal aktuelle faringer med fødselsbælg i Stald 1
2



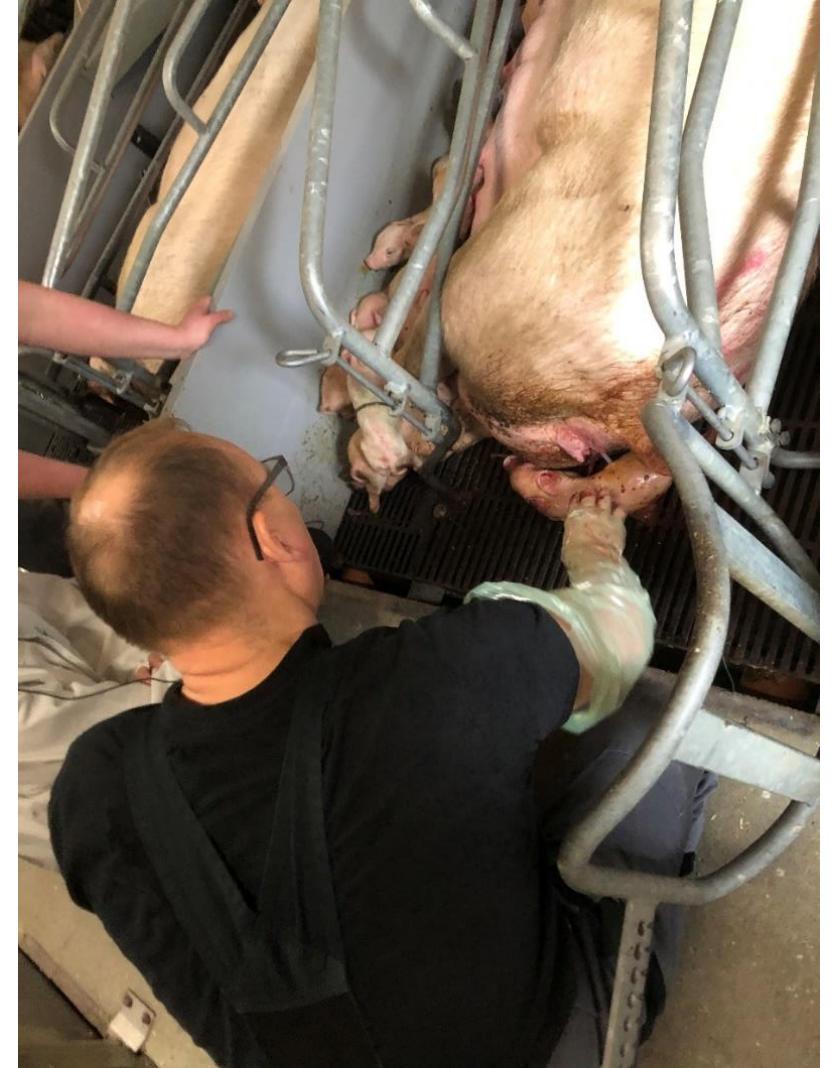
Spend your time on the most important periods

At what time is your help most important?

- When the main group of sows are farrowing
 - Weekdays?
 - In the daytime? afternoons? evenings? nights? mornings?

At what time is your help less important?

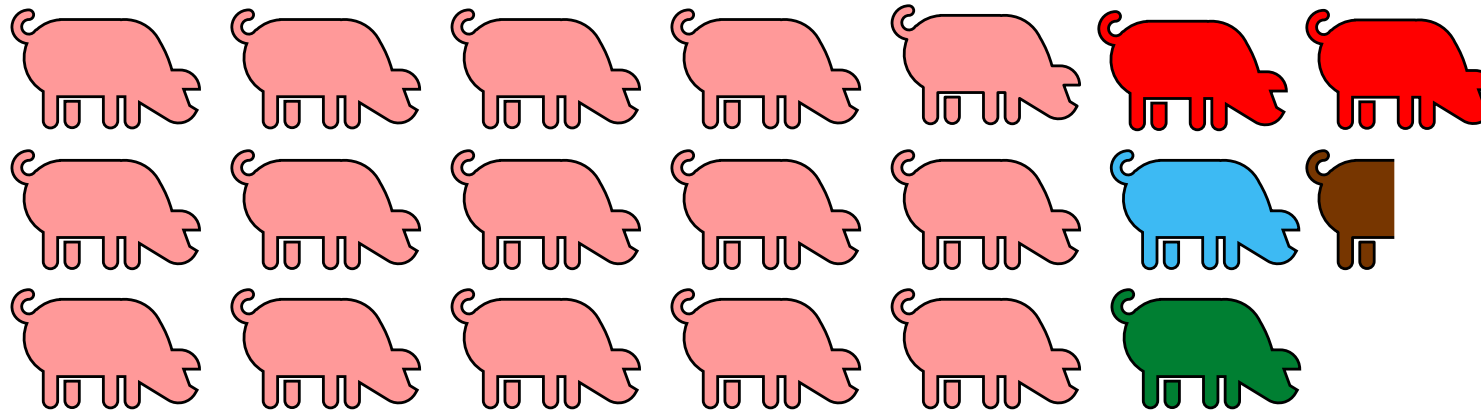
- When no or only a few sows are farrowing
- The first two hours after sows start farrowing
- When only gilts are farrowing



Average in DK: 19.6 piglets per litter

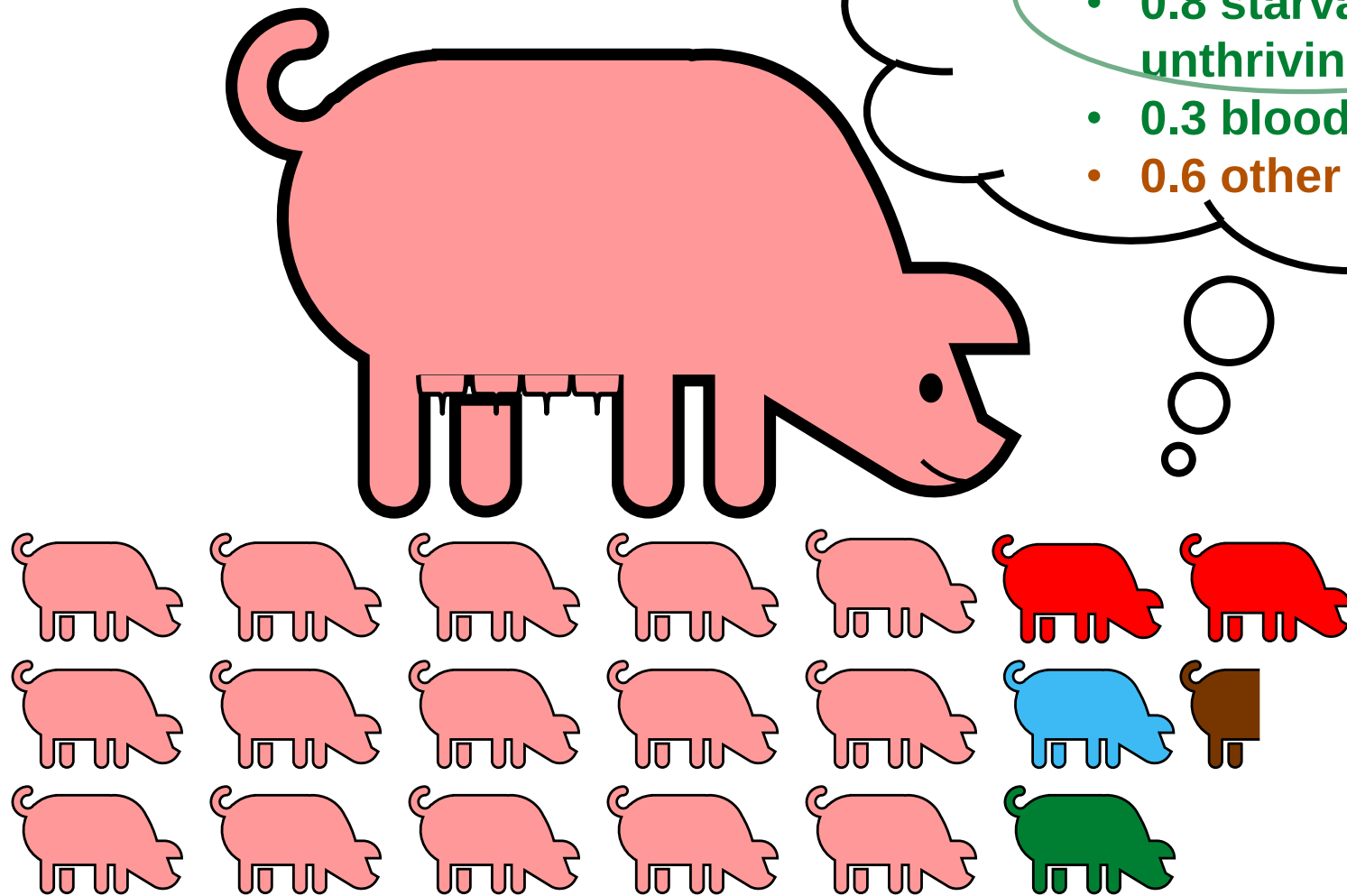
What's the cause of death on your farm?

- 1.9 stillborn
- 1.0 crushed
- 0.8 starvation, weak, unthriving
- 0.3 blood poisoning
- 0.6 other





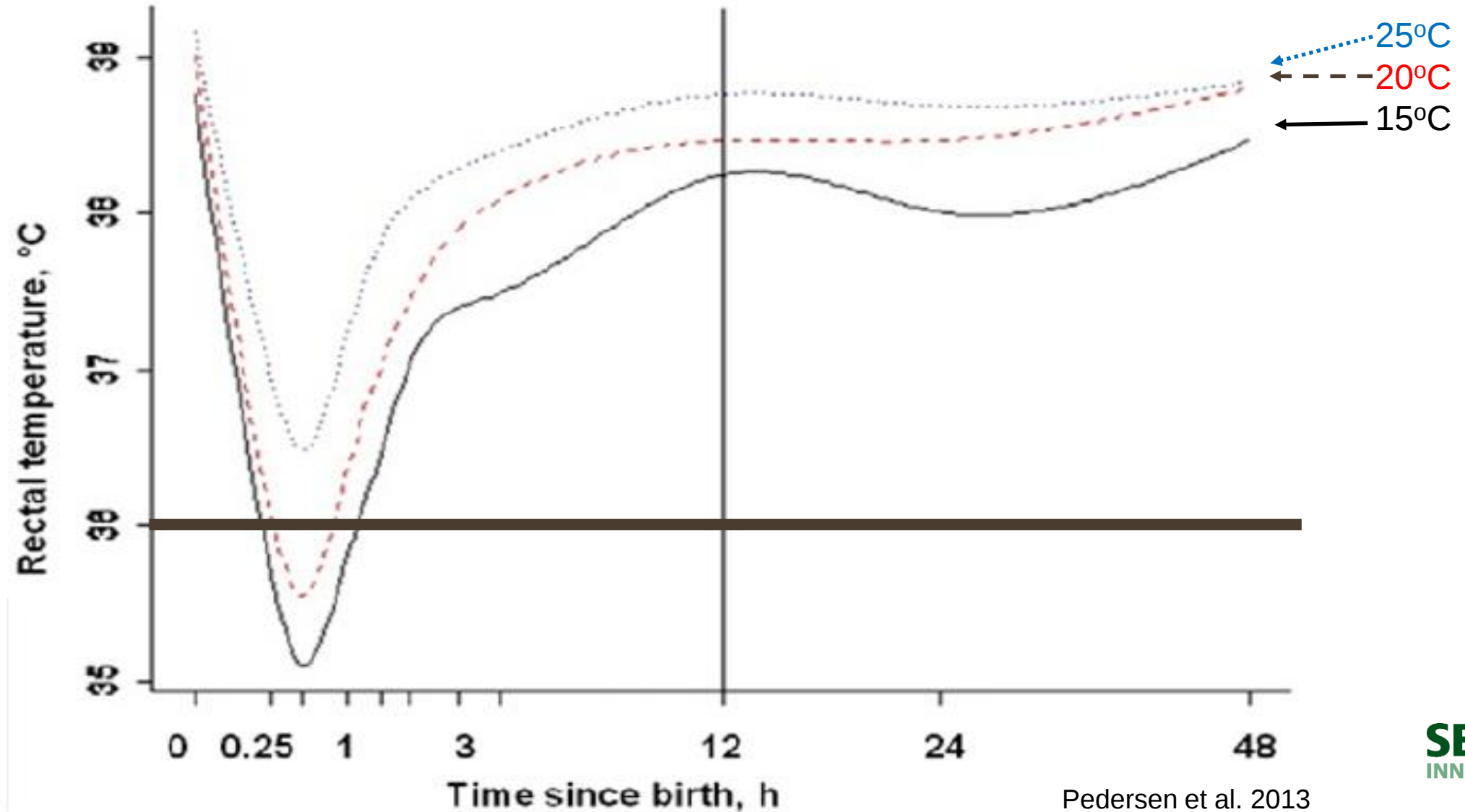
Average in DK: 19.6 piglets per litter



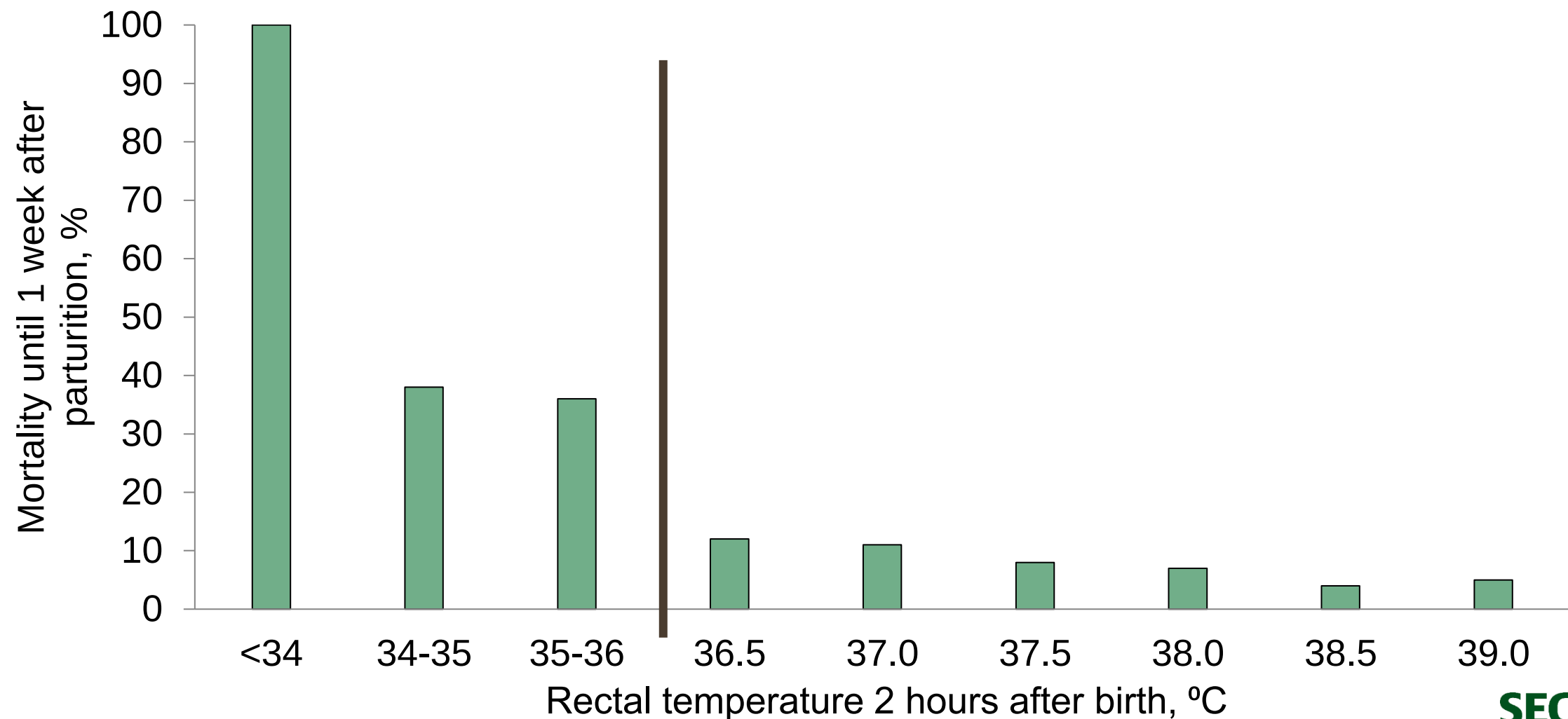
Brief no. 2115; Report no. 1703



Piglet temperature after birth



A temperature above 36 °C increases the survival rates



Four different ways to ensure heat



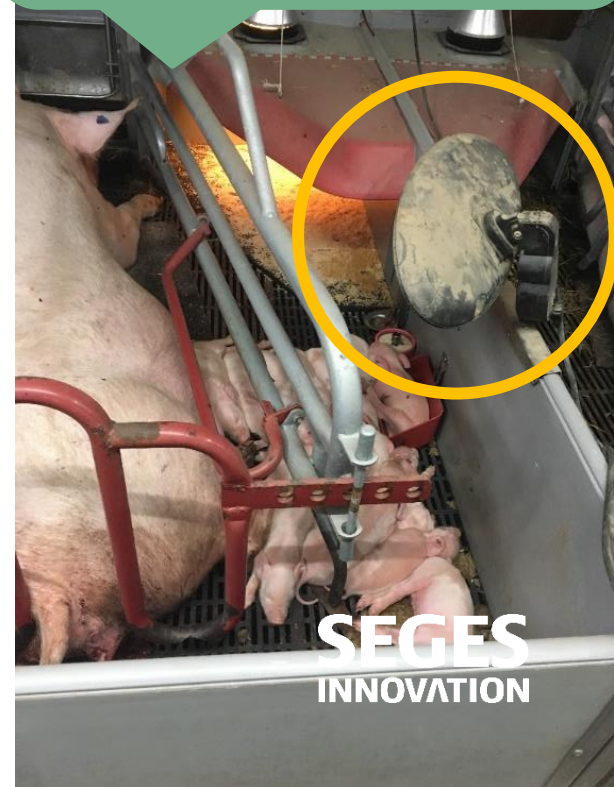
Piglet survival
increased from
88 to 92%

Higher
temperature for
all piglets



2.5 cm straw behind the
sow reduces piglets'
heat loss by 40%

Increase in small piglets
with a temperature
above 36 from 60% to
78%





After parturition

Heating by the udder

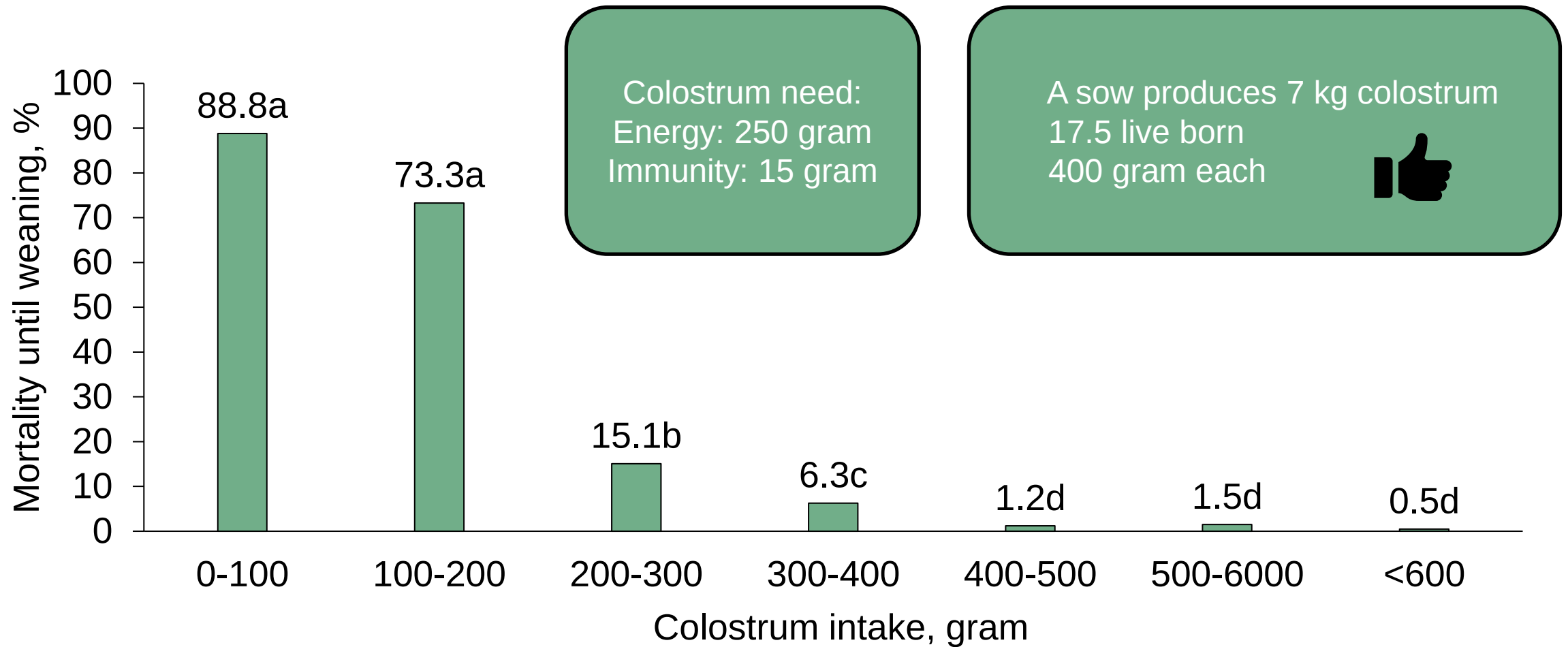
High risk area because of crushing

Colostrum - gives the piglets energy to not losing rectal temperature



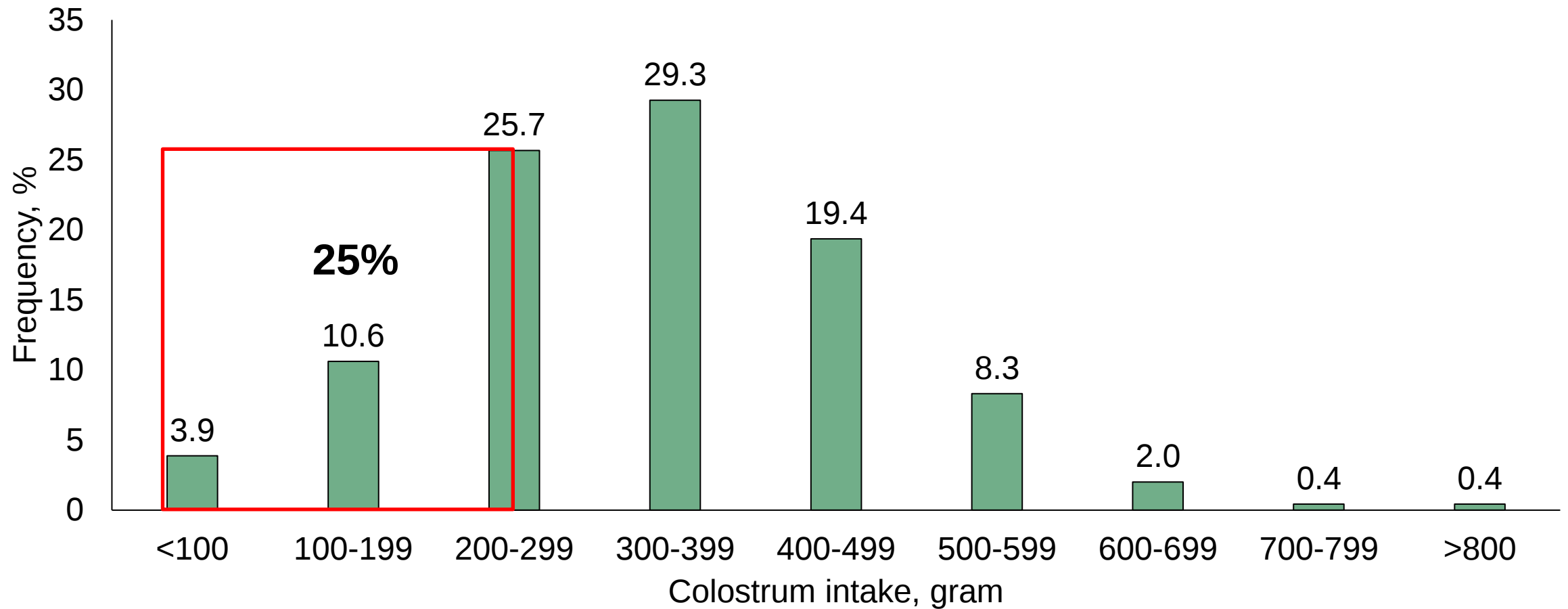
Colostrum is available for 24 hours
Colostrum covers piglets' need for
energy and antibodies

Piglet colostrum intake is positively correlated with survival



Nuntapaitoon et al. 2019

Variation in piglets' colostrum intake



Pedersen et al. 2020

**Can you see/feel colostrum in
a newborn piglet' stomach?**



Does the sow give any colostrum?



We can see the milk – but we have to kill the piglet



We are able to scan the stomach – we need an expert



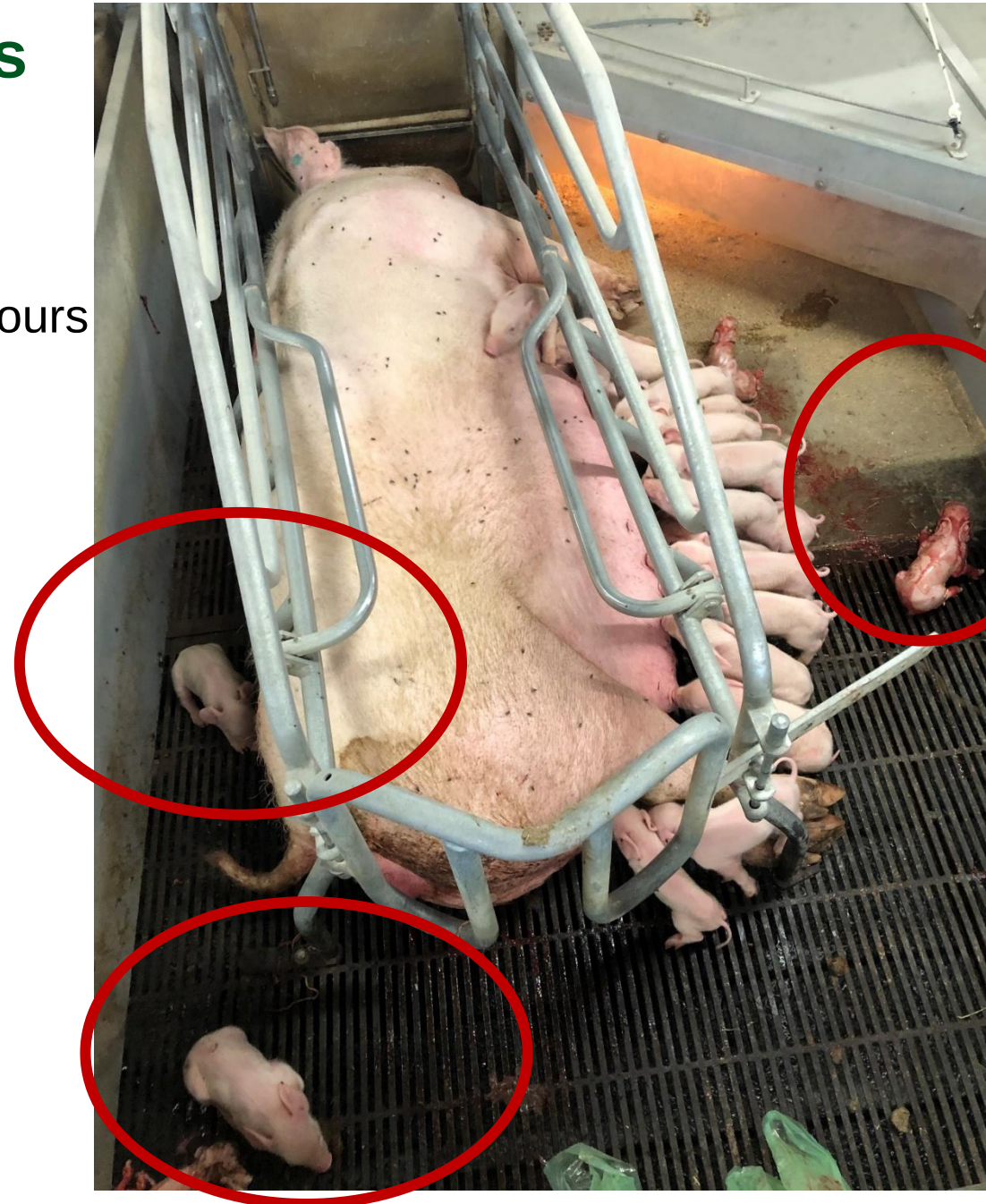
We can't feel colostrum in the stomach



How to secure colostrum for all piglets

- Help small and weak piglets to the udder
- Most piglets have ingested enough colostrum after 8 hours
- Colostrum from another sow is equally good
- Adjust litter size (continuously)
 - Mark first-born piglets
 - Move first-born large piglets
 - Move small piglets to a small nurse (with colostrum)
 - The remaining piglets stay with own mother
- Alternatively: Split suckling

What's the strategy at your farm?



Separating sow and piglets the first days after birth



Example from a farm

Day 1	At	Time in the creep area
Morning feeding (8 o'clock)	07.00-09.00	2 hours
Afternoon feeding (13 o'clock)	12.00-14.00	2 hours
Evening feeding (19 o'clock)	18.00-20.00	2 hours
		6 hours

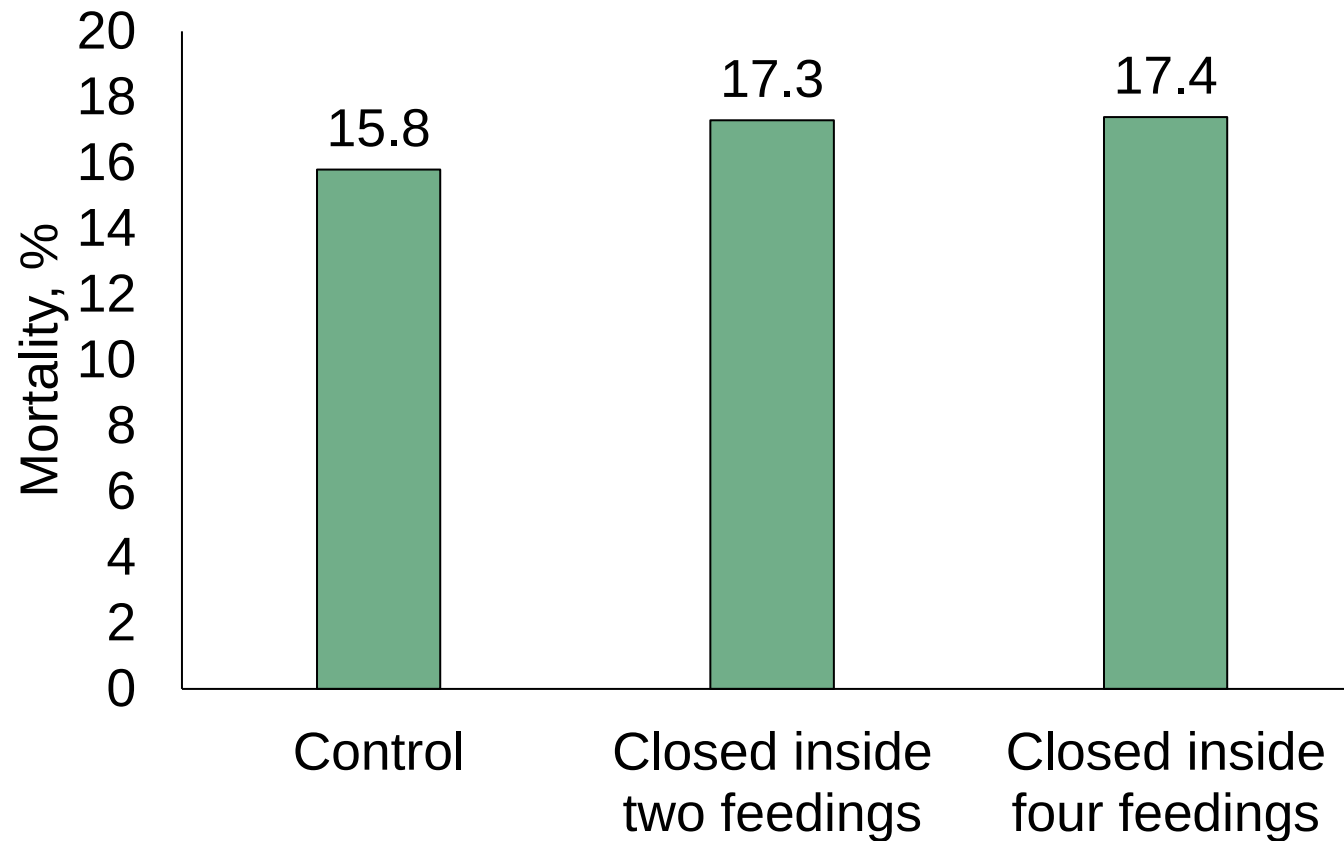
→ 6 hours of valuable time is lost from the sow and piglets



A photograph of several piglets in a straw-filled enclosure. Some piglets are standing and looking around, while others are lying down, appearing to be resting or sleeping. The piglets have pink skin and some have green markings on their backs. The enclosure is made of dark metal bars, and the floor is covered with dry straw. The lighting is warm and yellowish.

So what happens when you separate the piglets for 6 hours a day on the most critical days?

But why? Does it affect mortality?



Berg et al. 2006

6 hours....

- A milk let down for every 50 min
- Lose 7 milk let downs in 6 hours
- 12-gram milk per milk let down ~ 86 gram

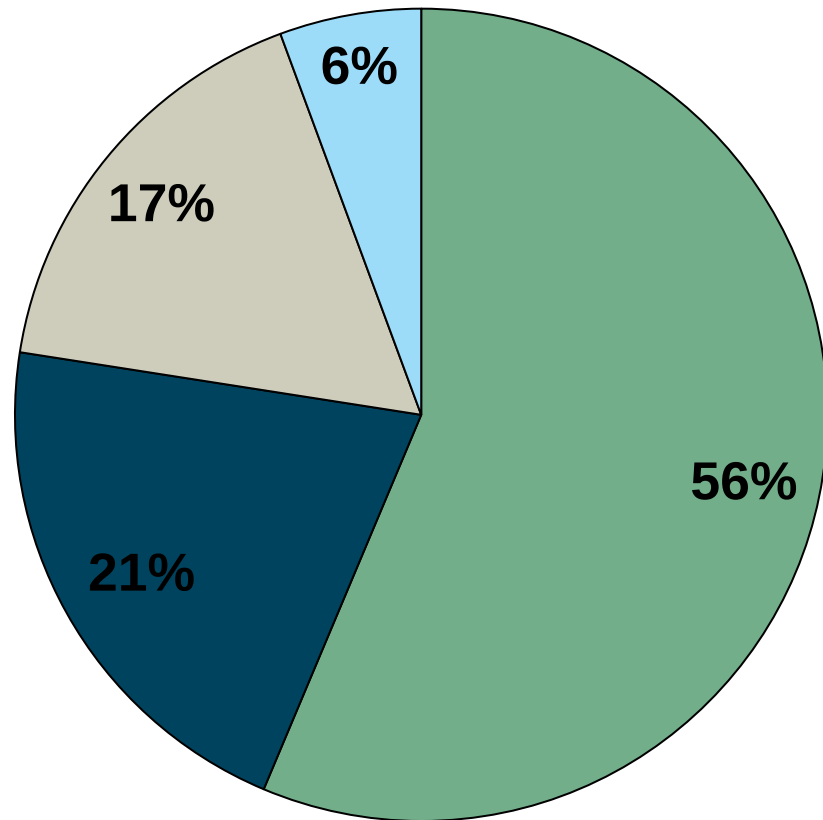
OR

- 6 hours = 25% of a day
- Potentially 25% of colostrum or energy intake

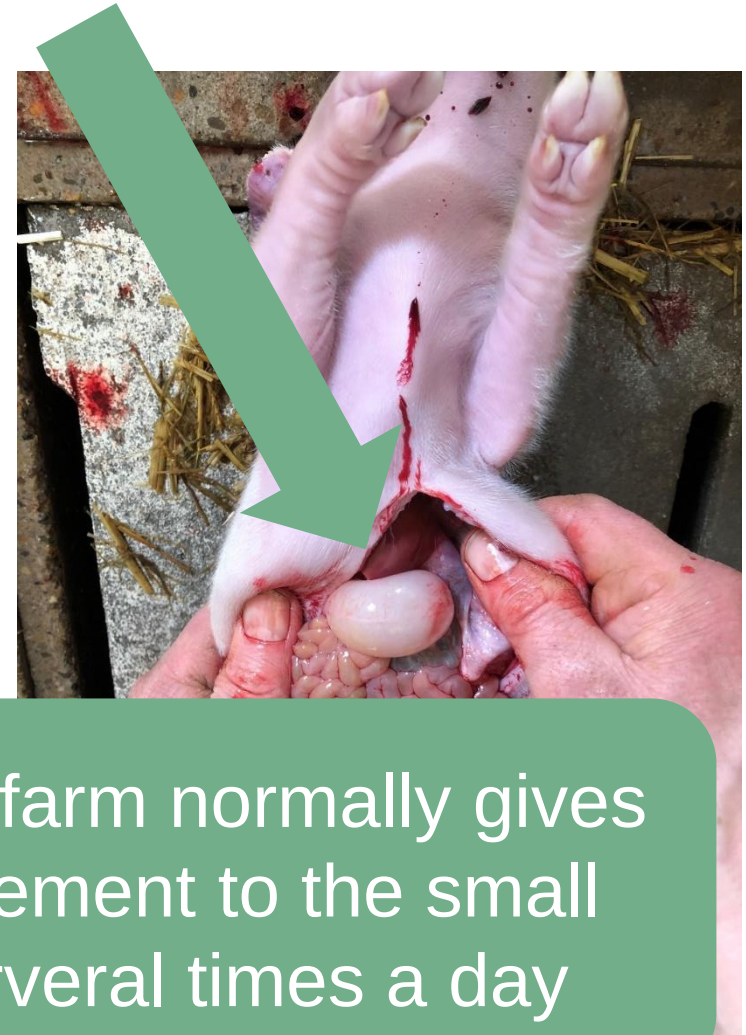


Spinka et al. 1997; Pedersen et al. 2011; Pedersen et al. 2020

77% of the crushed piglets didn't have milk in the stomach (Autopsy of 308 piglets)



- Tom, har ikke drukket
- Tom, spor af mælk
- Delvist fyldt



Notice - this farm normally gives milk replacement to the small piglets serveral times a day