EAAP Cattle Breeding Tour.

Organised by
Irish Cattle Breeding Federation,
in conjunction with Teagasc.

29th August 2007

Visits to the farms of;

Paul & Jennifer Kinch,
Rocklittle, Arklow, Co.Wicklow
(Dairy Farm Visit)
&
David & Paula Johnson,
Penrose House, Redcross, Co.Wicklow
(Beef Farm Visit).

1. EAAP Cattle Breeding Tour.

Overview of farm visits.

- ICBF are organising an informative farm visit to 2 commercial farms (one dairy and one beef), as part of the EAAP mid-conference tours. Both farms are heavily profit focused and understand the benefits of cattle breeding. Both are actively participating in various cattle breeding activities, such as AI, milk recording, on-farm weight recording & ICBF HerdPlus.
- The farms are located south of Dublin, about 1 hour 15 minutes from the conference venue. The schedule for the trip is as follows;
    - 1 PM Depart UCD
    - 2.15 PM Arrive at dairy farm; Paul Kinch, Rocklittle, Arklow.
    - 3.15 PM Leave first farm (tea & refreshments provided).
    - 3.45 PM Arrive at beef farm; David Johnson, Redcross, Co. Wicklow.
    - 4.45 PM Leave second farm
    - 6 PM Arrive back at UCD.
- The farm visits will include; (i) an examination of the system and profitability of the farm being visited, and (ii) an analysis of how cattle breeding, is contributing to the profitability of both farms. The visit will include a short walk around the farm, with 2 stops (as outlined above). Tea & refreshments will be served at the end of the farm-walk on the first farm.

Details of farm visits.

- ***Dairy farm.*** The dairy farm visit is to the farm of Paul Kinch, Rocklittle, Arklow, Co. Wicklow.
    - ***Output.*** Paul is milking 90 cows and supplying 500,000 litres of milk. Farm size is 50 hectares. Since he took over the farm in 1997, output has trebled.
    - ***Profit.*** Paul is very focused on profit and completes the Teagasc Profit Monitor on an annual basis. Net proft/litre in 2006 was 12 cts/litre (or ~ €800/hectare), which is above the Teagasc national average for dairy farm profit.
    - ***Breeding.*** Paul is very focused on the benefits of cattle breeding. The average EBI of the herd is €46, with the 2007 borne calves being at €85 (top 15% of herds nationally)
    - ***Future.*** Paul is an enthusiastic young dairy farmer, with a young family. He is committed to dairy farming. Goal for the future is to milk 100 cows and supply 680,000 litres, on one labour unit.
- ***Beef farm.*** The beef farm visit is to the farm of David Johnson, Redcross, Wicklow.
    - ***Output.*** David runs a suckler-beef enterprise, with steers and heifers slaughtered in Ireland. Herd size is 100 cows (mainly Charolais, Limousin & Simmental breeding). Farm size is 100 hectares and Kg beef output/hectare is currently some 580 kg LW/ha.
    - ***Profit.*** David is very focused on profit and completes the Teagasc Profit Monitor on an annual basis. Net proft/ha (excluding premia payments) was €126, which is above the national average for beef farm profit.
    - ***Breeding.*** David is very focused on the benefits of cattle breeding, with all replacements bred from within the herd. Record keeping is exceptional. Bulls are selected on the basis of relevant indexes, including the new €uro-Star beef indexes.
    - ***Future.*** David is an enthusiastic young beef farmer, with a young family. He was a recent recipient of a National award (Bord Bia Marketing & Partnership winner) and is committed to beef farming for the long-term. Future goal is to increase beef output on the farm to 750 kg LW/lu.

2. Cattle Breeding in Ireland; An Overview

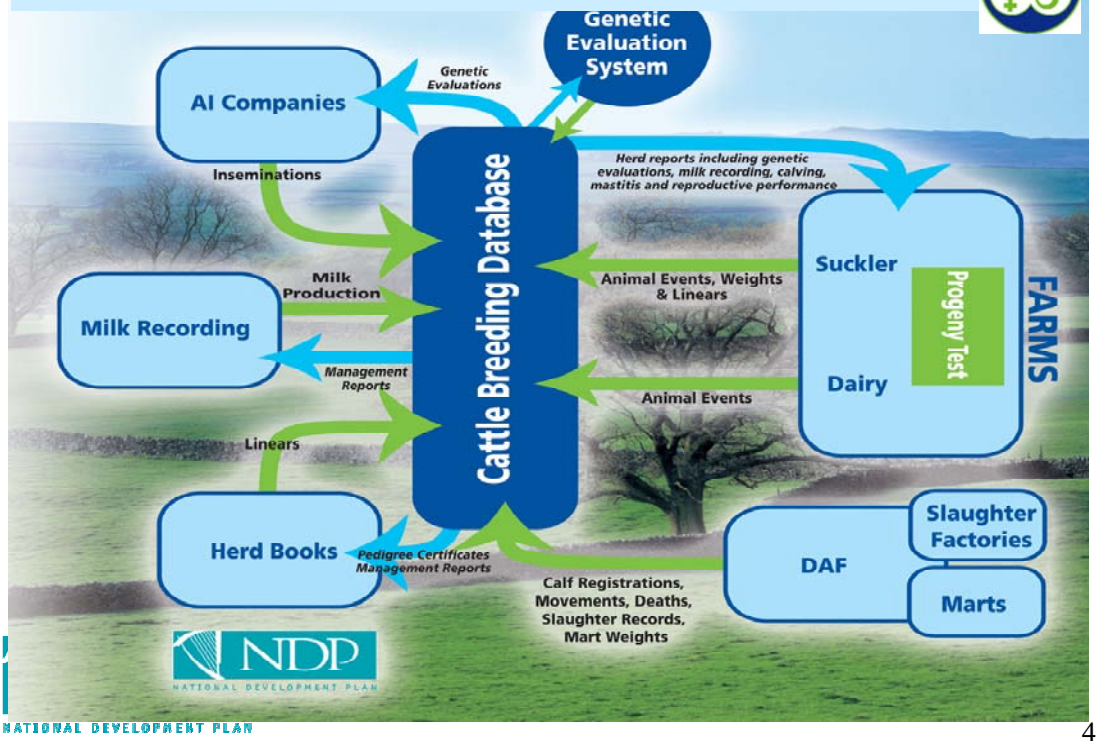
Irish Cattle Breeding Federation

- Formally established in 2000.
- Goal; "maximise genetic gain (€) for farmers & dairy & beef industries".
- Main cattle breeding functions;
  - Central cattle breeding database.
  - Genetic evaluations.
  - Optimal breeding schemes.
  - Information for breeding industry.
- Shareholding; 18% AI; 18% Breed Ass., 18% milk recording & 46% farm organisations.
- Funding; Farmer tags, services & DAF (NDP).

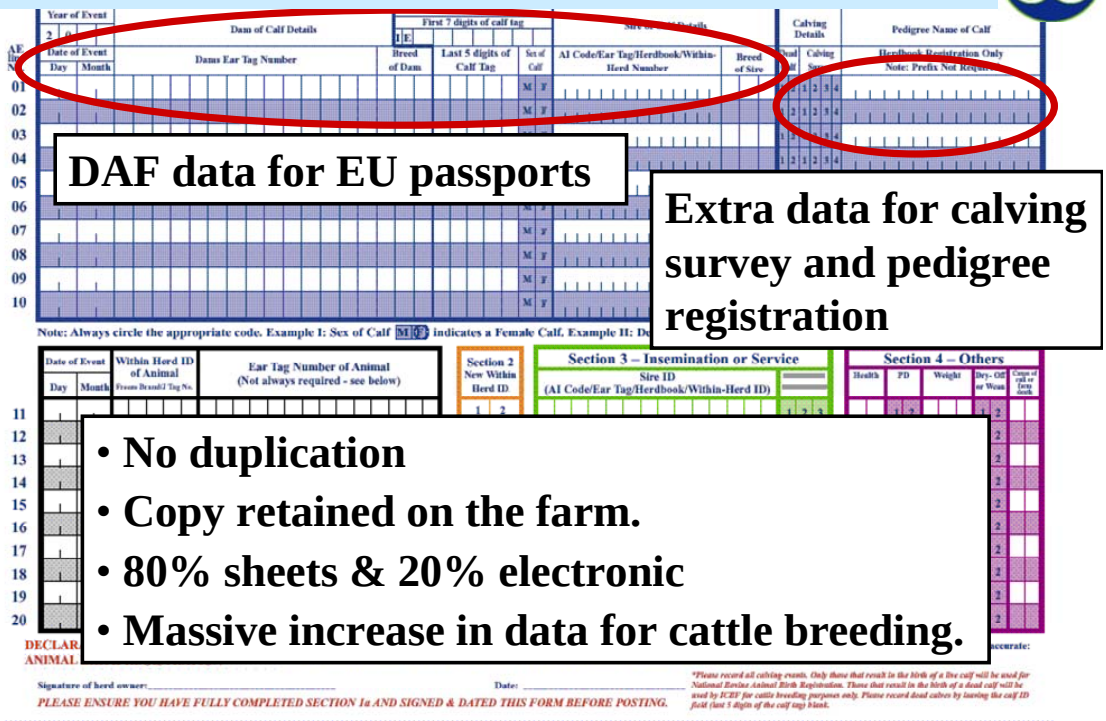
Cattle Breeding Data

- 2.131m calf births in Ireland in 2006
  - 1,038m from dairy dams (49%)
  - 1,092m from beef dams (51%)
  - Half of dairy cows also bred to beef bulls.
- Two cattle breeding databases (in synchrony).
  - DAF (for EU traceability)
  - ICBF (for additional cattle breeding data)
  - Single copy of truth & no duplication for farmers.
- Farmers must "sign-up" to be involved in ICBF cattle breeding database (i.e., data release).
  - 1,124m births "also" registered in ICBF database
  - 600k registered via ICBF Animal Events system.

Key data flows (Figure 3.2. Page 5)



Animal Events (Figure 3.3. Page 6)



Key data flows (Figure 3.4. Page 6)

Data flows	***2006***	***2001****	***Relative increase***
Department of Agriculture (DAF)			
- CMMS Births	1,124,273	0	
- Slaughter records	625,266	2,450	255.2
ICBF Animal Events/HerdPlus			
- Births	600,928	0	
- Pedigree birth registrations	85,754	85,416	1.0
- Calving performance	489,084	18,183	26.9
- DIY AI serves	137,046	0	
- On-farm linear scoring	16,781	9,809	1.7
- On-farm weight recording	7,271	6,039	1.2
- Farmer mart weight recording	243,047	0	
Herdbooks			
- Dairy linear scoring	23,330	15,386	1.5
Milk Recording Organisations			
- Milk recording	408,375	336,868	1.2
AI Companies			
- Technician serves	142,251	18,183	7.8

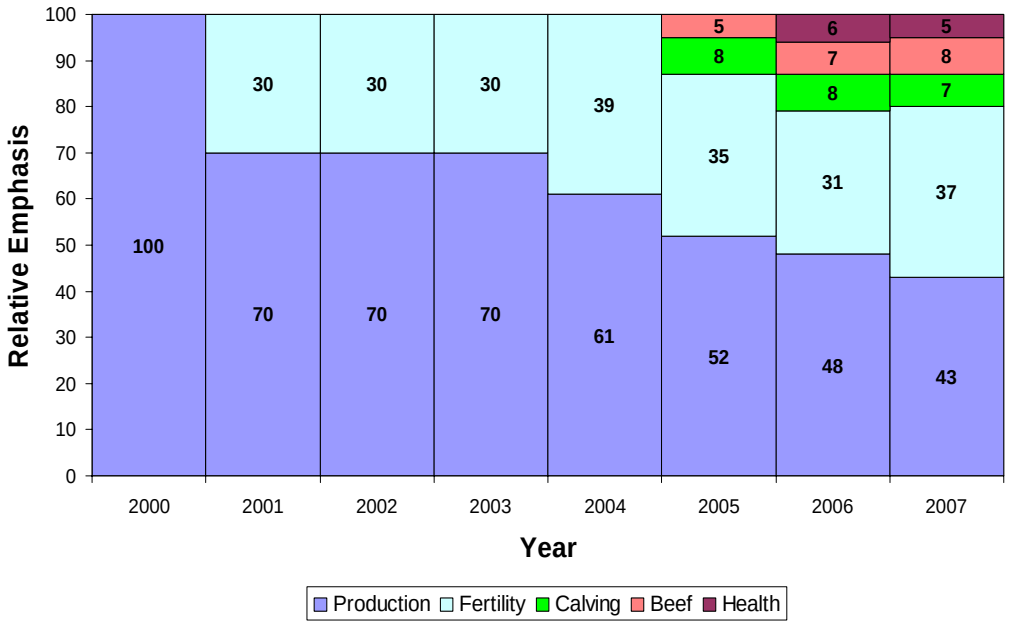
**** Data recorded via AI progeny test, herdbook & milk recording systems***

EBI (Table 4.1, p8).

Sub - Index	Trait	Economic Weight	Trait Empasis	Overall Emphasis
Production	Milk	-0.085	13%	**42%**
	Fat	0.96	5%	
	Protein	5.36	24%	
Fertility	Calving Interval	-10.87	24%	**37%**
	Survival	10.51	13%	
Calving	Direct Calving Difficulty	-3.26	3%	**8%**
	Maternal Calving Difficulty	-1.28	1%	
	Direct Gestation Length	-4.47	3%	
	Calf Mortality	-2.85	1%	
Beef	Cull Cow	0.04	0.2%	**7%**
	Carcass Weight	1.4	4%	
	Carcass Conformation	10.32	2%	
	Carcass Fat	-11.71	2%	
Health	Lameness	1.13	0.4%	**5%**
	Udder - SCC	-55.48	5%	

- EBI = € profit/lactation; Output – costs.

Developments in EBI; (Fig 4.1, p8)



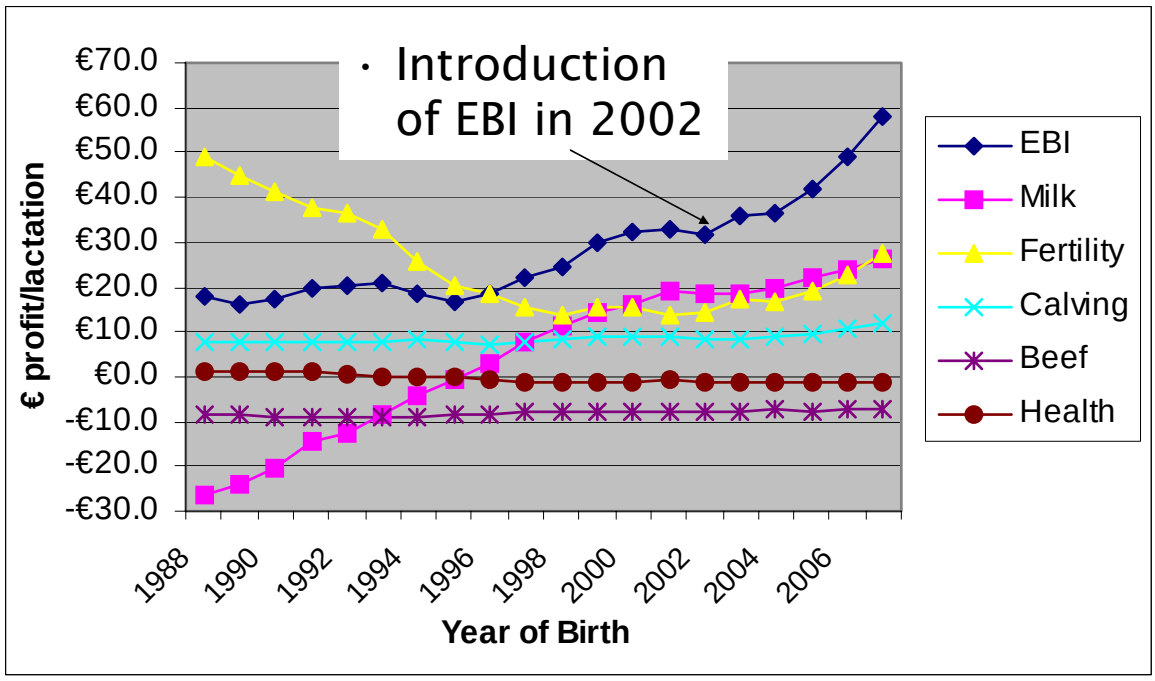
- EBI is continuously evolving (2001-2007)

€uro-Star Indexes; (Table 4.2, p8)

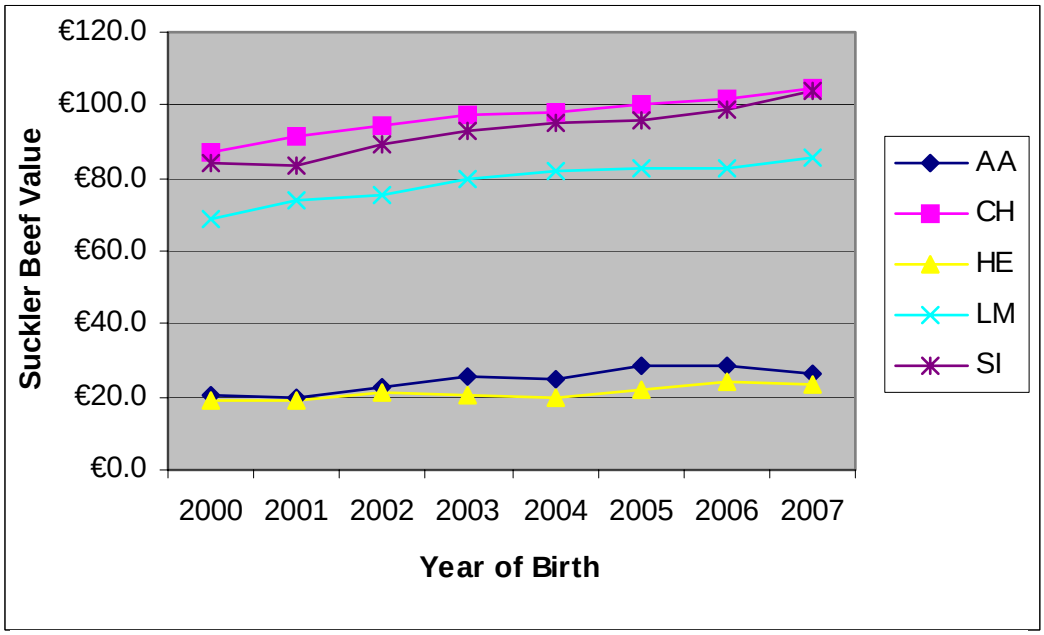
Sub - Index	Trait	Econ wt	Rel emph
Calving Traits	Calving Difficulty (%)	1.09	53%
	Gestation Length (Days)	0.79	25%
	Calf Mortality (%)	2.19	22%
Wean Export	Weaning Weight kg	0.78	55%
	Calf Quality (cts/kg)	1.29	45%
Beef Carcass	Carcass weight (kg)	1.17	46%
	Weaning weight (kg)	0.52	24%
	Carcass conformation (score)	5.37	11%
	Dry matter intake (kg/day)	0.03	12%
	Carcass fat (score)	3.04	7%
Replace Milk & Fertility	Cow Survival (%)	8.3	26.0%
	Calving Interval (Days)	3.16	18%
	Age at First Calving (Days)	0.69	10%
	Maternal Calving Difficulty (%)	4.31	10%
	Maternal Weaning Weight (kg)	3.3	29%
	Cull Cow Carcass Weight (kg)	0.21	7%
Replace Calf Vaue	Calving Difficulty (%)	4.08	6.0%
	Gestation Length (Days)	2.96	2%
	Calf Mortality (%)	9.76	4%
	Weaning weight (kg)	2.1	32%
	Dry matter intake (kg/day)	0.07	13%
	Carcass weight (kg)	2.88	29%
	Carcass conformation (score)	13.21	10%
	Carcass fat (score)	7.49	4%

- €uro-Star = € profit/progeny.

Genetic Trend in EBI (Fig 4.4, p 11)



Gen Trend in €uroStar (Fig 4.7, p11)



- €uro-star indexes just launched (2007)

Future Developments (page 27).

1. EDIY Milk Recording
   - Launched in 2005.
   - 5%/year increase in MR 05 & 06 (now 40%)
2. AI handhelds
   - Launched in 2006.
   - Data recording, inbreeding, sire advice, evaluations..
3. G€N€ IR€LAND.
   - Increase genetic gain (€/cow/year).
   - Progeny test service for AI orgs & herdbooks.
4. ICBF HerdPlus
   - New reports; EBI, calving, fertility…
   - Launch in dairy (2,700 farmers)…moving to beef.

Summary

- Genetic gain is dependent on;
  - High volumes of accurate data for selection
  - Indexes on which to identify the best animals
  - Breeding programmes that maximise gain.
- ICBF have made good progress in all 3 areas.
  - Database, indexes (e.g., EBI) & G€N€ IR€LAND.
- But…..“Much done, a lot more to do”, An Taoiseach, Bertie Ahern
- Same could be said for ICBF!
- Looking forward to the challenge.
- Enjoy your day on both farms.

3. Dairy Farm Visit; Paul Kinch, Rocklittle, Arklow
3i. Copy of Boards for Farm Visit.

Farm Details

- Farm size; 75 ha (50 ha on this farm).
- Quota; 507k litres (209k in 1997).
- Stocking rate; 1.76 LU/ha.
- REPS farming.
- Spring/winter calving (liquid contract).
- Maximum use of grass in diet.
- One person unit.

Cows	89	Milk yield/cow	5,546 litres
		Calving Interval	376 days
Repl 0-1	16	Fat %	3.81%
Repl 1-2	13	Protein %	3.26%
Repl 2+	6	Kg fat and protein	404 kg
Cattle	31	Milk price	29.1 c/l

€ Performance

Herd Performance	**This farm**	**Target**
Gross output (ct/l)	28.3	30.3
Variable costs (ct/l)	6.8	8.4
Fixed costs (ct/l)	9.5	8.5
Net profit (ct/l)	**12.0**	**13.5**
Direct Payments (ct/l)		
- REPS	0.85	
- CAS	0.47	
- SFP	3.45	
Net Profit inc. DP's (ct/l)	**16.8**	

- Good farm profitability
  - 12 ct/l or €800/ha (~€1120 inc DP's)
  - Comparable with best of EU farmers.

Future Plans

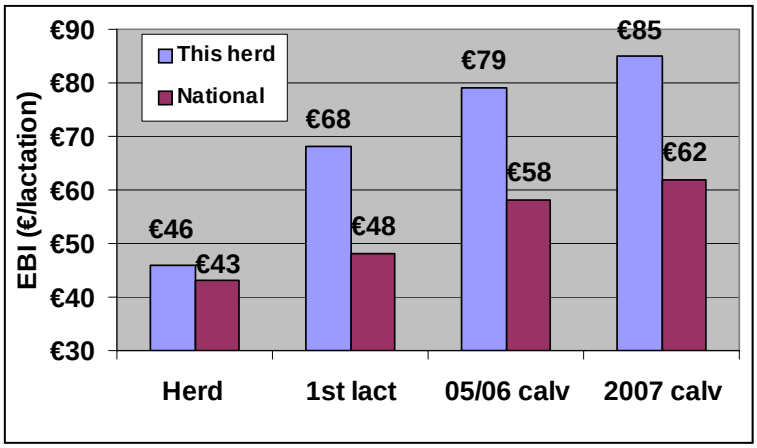
- Phase out beef system.
  - Already started.
- Increase milk output.
  - 100 cows @ 6,800 litres.
  - 500 kg milk solids/cow.
  - 1,000 kg milk solids/ha.
- Minimal expansion of dairy facilities required.
  - 14 units & bulk tank.

Breeding

- All dairy replacements bred from AI.
- High EBI AI sires from ICBF Active Bull List.
- ICBF Breeding Chart.
  - Corrective mating.
- Technician AI service (AI handheld).
- 8 week breeding season.
  - 73 females bred to AI (113 inseminations).
  - 54 in-calf (74%) ~ 20% replacement rate.
  - 37 in-calf (51%) to 1st serve.
- Data recording.
  - AI handheld (inseminations).
  - ICBF website (pregnancy diagnosis data).

EBI

- Herd EBI; €46 (€19 MilkS & €27 Fert)
- 2007 calves; €85 (€37 MilkS & €38 Fert).
- Excellent genetic gain.
  - High EBI AI bulls.



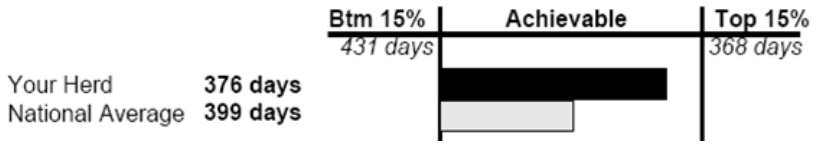
Why EBI?

	EBI	M kg	F kg	P kg	
High EBI cows	€95	21.2	0.82	0.73	
Low EBI cows	-€8	21.4	0.74	0.67	
Difference	€103	-0.23	0.09	0.06	
Economic Values		-0.09	0.96	5.36	
Profit/lact		**€6**	**€25**	**€94**	**€125**

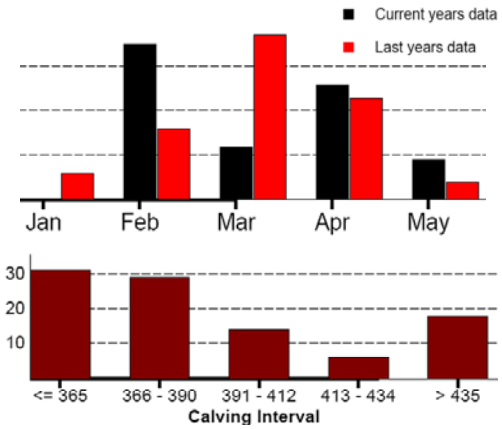
- High EBI cows are more profitable.
- High solids & better fertility.
- Consistent with EBI prediction.

Calving

- Calving Interval (median); 376 days.



- Good calving interval…but;
  - % April & May calving has increased.
  - ~ 20% cows are > 435 days.
  - Linked to system of milk production.



Summary

- Committed young dairy farmer
- High profit focus.
- Future; 100 cows, 680k litres & 1 labour unit.
  - €100k net profit is achievable.
- Using ICBF breeding & management information to help achieve future goals.
  - EBI, HerdPlus, AI & milk recording.
- ***EBI will deliver more profit (€)***

3ii. ICBF Breeding & Management Reports for this farm

- ***Calving Performance***

Excellent Calving Interval (23 days better than National Average)

1. Summary Data

Report is based on beef cows with a calving record in the cattle breeding database and where the calving date is between 01/07/2006 and 30/06/2007

	All	Heifers
Total Calvings	82	16
No. of Calves - Live at Birth	79	15
No. Calves - Dead at Birth	4	1
No. Male Calves - Live at Birth	40	7
No. Female Calves - Live at Birth	39	8

	All	
No. of Cows not calved	7	
No. of Calves - Live at 28 days	79	
	Cows	Heifers
Average age at calving	6y 4m	2y 4m

2. Performance Statistics - relative to all beef herds in the database

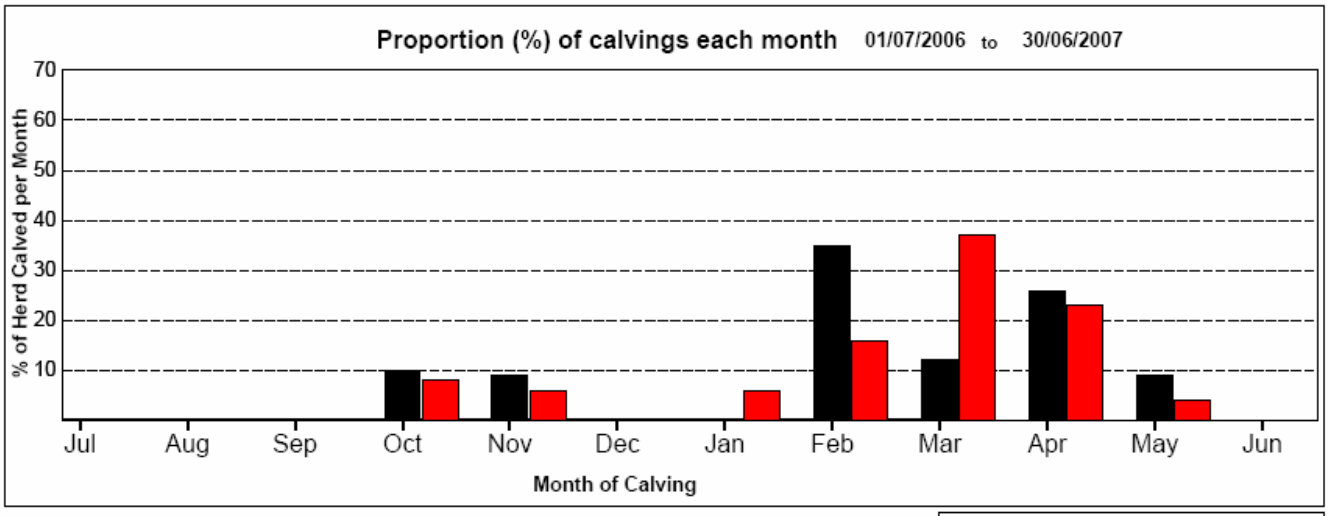
Herd figures are expressed relative to all beef herds in the database, where the herd has a minimum of 10 calvings during the calving period.

			Btm 15%	Achievable	Top 15%
			431 days		*368 days*
1. Calving Interval (days) Median Calving Interval between most recent and previous calving date (if available), for cows with a calving record during the period.	Your Herd	**376 days**			
	National Average	**399 days**			
			3%		*0%*
2. Mortality - Dead at Birth (%) Number of calves born dead expressed as a proportion of all calf births recorded during the period.	Your Herd	**4.8%**			
	National Average	**1.2%**			
			6%		*0%*
3. Mortality - Dead at 28 Days (%) Number of calves born dead or dead within 28 days, expressed as a proportion of all calf births recorded during the period.	Your Herd	**4.8%**			
	National Average	**2.3%**			
			40%		*0%*
4. Cows not calved in Period (%) Number of cows not calved during the period, expressed as a proportion of all eligible females in the herd.	Your Herd	**8%**			
	National Average	**10%**			
			0.4		*0.9*
5. Calves per cow per year * Number of calves per cow per year, expressed as a proportion of all eligible females in the herd.	Your Herd	**0.87**			
	National Average	**0.8**			
			0%		*98%*
6. Births with known sire (%) Number of births with a known sire (valid in database), expressed as a proportion of all calf births recorded during the period.	Your Herd	**100%**			
	National Average	**37%**			
			0%		*95%*
7. Births with calving survey data (%) Number of births with calving survey data, expressed as a proportion of all calf births recorded during the period.	Your Herd	**100%**			
	National Average	**31%**			
			6.3		*3.1*
8. Average no. of calvings per cow Average number of calvings per cow	Your Herd	**3.7**			
	National Average	**4.1**			

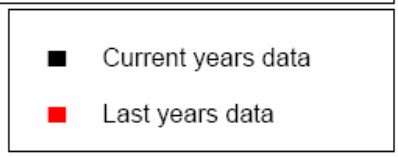
Excellent use of ICBF Animal Events system

Sire's of calves extremely well recorded

3. Current Calving Pattern



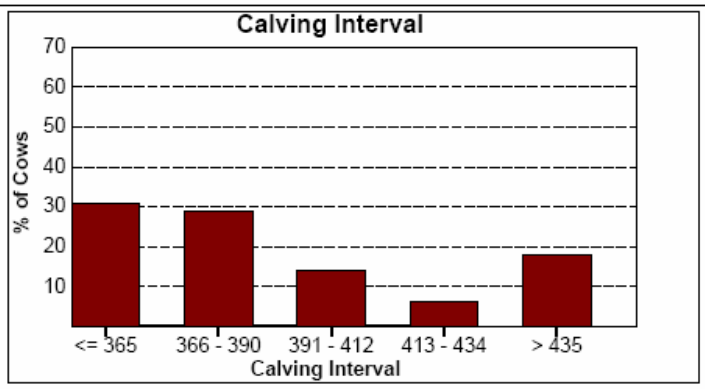
Month	No. Calved	% Calved	Month	No. Calved	% Calved
Jul	0	0	Jan	0	0
Aug	0	0	Feb	29	35
Sep	0	0	Mar	10	12
Oct	8	10	Apr	21	26
Nov	7	9	May	7	9
Dec	0	0	Jun	0	0



4. Additional Information

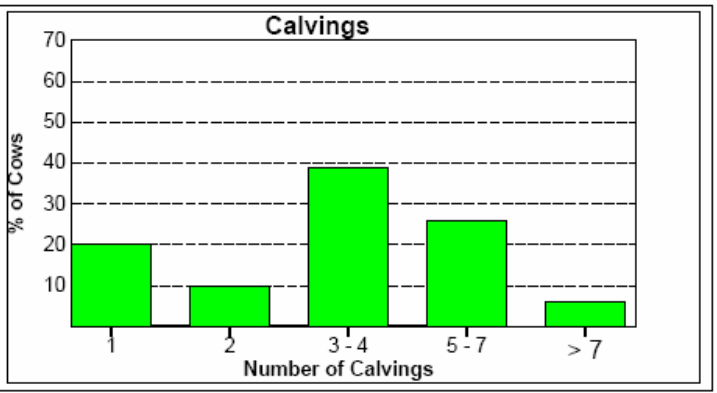
A. Calving Interval

Calving Interval	No. Calved	% Calved
% Cows calved <= 365 days	20	31
% Cows calved 366 - 390 days	19	29
% Cows calved 391 - 412 days	9	14
% Cows calved 413 - 434 days	4	6
% Cows calved > 435 days	12	18



B. Number of Calvings

Calvings	No. cows	% of cows
1st Calving	16	20
2nd Calving	8	10
3rd - 4th Calving	32	39
5th - 7th Calving	21	26
> 7th Calving	5	6



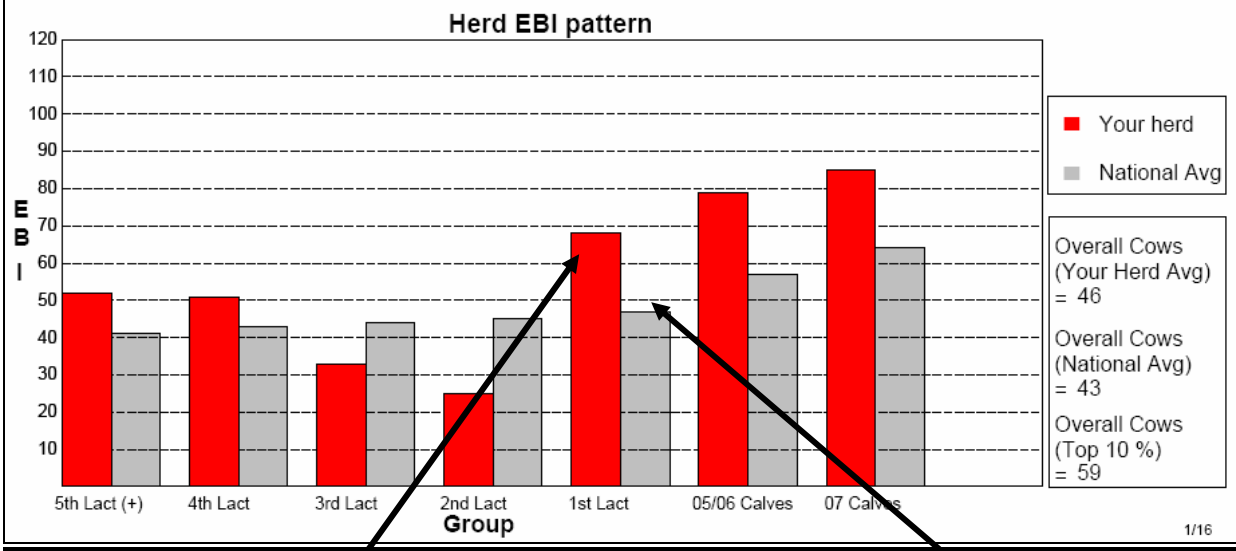
- ***EBI Report***

Breakdown of Overall EBI figure displayed

Group	Num of Cows	M Kg F Kg P Kg	F% P %	Surv% CI Days	Milk Solids % Contrib	Fertility % Contrib	Calving % Contrib	Beef % Contrib	Health % Contrib	EBI €
Overall Cows	85	134 4.5 4.8	 -0.01 0.01	 0.8 -1.7	€ 18.9 33.7%	€ 27.2 48.5%	€ 9.8 17.5%	€ -7.6 0%	€ 0.2 0.3%	€ 46
1st Lactation	19	182 8.1 7.7	 0.02 0.03	 1.0 -1.5	€ 33.6 44.4%	€ 27.3 36%	€ 14.8 19.6%	€ -7.1 0%	€ -0.6 0%	€ 68
2nd Lactation	13	209 2.9 5.5	 -0.09 -0.02	 0.4 -0.7	€ 14.3 40.3%	€ 12.1 34.1%	€ 9.1 25.6%	€ -9.1 0%	€ -1 0%	€ 25
3rd Lactation	21	185 4.6 5.9	 -0.04 0	 0.4 -0.6	€ 20.2 50%	€ 11 27.2%	€ 8.4 20.8%	€ -7.3 0%	€ 0.8 2%	€ 33
4th Lactation	9	111 6.6 3.4	 0.05 0	 1.0 -2.5	€ 15.4 23.4%	€ 37.6 57.1%	€ 11.5 17.4%	€ -8.5 0%	€ 1.4 2.1%	€ 51
5th Lactation (+)	23	15 1.5 1.7	 0.02 0.03	 1.1 -3.4	€ 9.5 14.8%	€ 48.6 75.5%	€ 5.7 8.9%	€ -7 0%	€ 0.5 0.8%	€ 52

2. Dairy Youngstock

07 Calves	16	193 10.2 8.1	 0.06 0.03	 1.3 -2.2	€ 36.7 39.9%	€ 37.7 41%	€ 17.3 18.8%	€ -7 0%	€ 0.3 0.4%	€ 85
05/06 Calves	22	207 8.7 6.9	 0.02 0	 1.0 -2.6	€ 27.6 31.6%	€ 39.1 44.8%	€ 18.4 21.1%	€ -8 0%	€ 2.1 2.4%	€ 79



EBI Progress of the Herd displayed

Benchmark against the National Average

Top 10 v Bottom 10 Cows.

Steps taken:

1. The top and bottom 2 EBI cows from each birth year (2000-2004) were selected and the following data extracted:
   - Average daily yields for milk, fat and protein kgs over their lifetime.
2. The average daily milk production was calculated for both groups (denoted A & B).
3. The difference between the 2 groups (denoted C) was established and an overall profit was calculated (denoted D).
4. The cows are ordered by birth year.

Top

	Cow FB No.	EBI	Birth Date	Recorded Lact's	Lifetime DIM	Lifetime yield (kg/day) M Kg	F Kg	P Kg	F%	P%
	196	€ 122	21-Mar-00	4	1075	25.66	0.92	0.87	3.59%	3.39%
	227	€ 73	17-Nov-00	4	1172	21.73	0.83	0.7	3.82%	3.22%
	247	€ 77	09-Mar-01	3	827	21.84	0.9	0.75	4.12%	3.43%
	255	€ 126	21-Apr-01	3	934	21.69	0.96	0.78	4.43%	3.6%
	287	€ 89	22-Feb-02	2	568	21.43	0.8	0.73	3.73%	3.41%
	296	€ 82	18-Mar-02	2	575	21.87	0.79	0.76	3.61%	3.48%
	333	€ 95	12-Feb-03	2	609	19.86	0.71	0.67	3.58%	3.37%
	335	€ 94	13-Feb-03	2	610	15.92	0.66	0.58	4.15%	3.64%
A	**AVE**	**€ 95**		**2.75**	**796**	**21.25**	**0.82**	**0.73**	**3.88%**	**3.44%**

Bottom

	Cow FB No.	EBI	Birth Date	Recorded Lact's	Lifetime DIM	Lifetime yield (kg/day) M Kg	F Kg	P Kg	F%	P%
	202	€ 44	17-Sep-00	4	1250	24.1	0.82	0.74	3.4 %	3.07%
	226	€ 54	15-Nov-00	3	1215	19.34	0.76	0.62	3.93%	3.21%
	538	€ -41	18-Sep-01	2	708	25.04	0.85	0.77	3.39%	3.08%
	557	€ -13	21-Oct-01	1	441	21.22	0.86	0.72	4.05%	3.39%
	315	€ -50	03-Feb-02	1	366	24.5	0.79	0.75	3.22%	3.06%
	756	€ -34	15-Oct-02	1	761	16.21	0.52	0.54	3.21%	3.33%
	334	€ 4	13-Feb-03	1	277	22.43	0.7	0.67	3.12%	2.99%
	683	€ -30	05-Jun-03	1	305	19.01	0.59	0.57	3.1 %	3%
B	**AVE**	**€ -8**		**1.75**	**665**	**21.48**	**0.74**	**0.67**	**3.43%**	**3.14%**

	Difference		M Kg	F Kg	P Kg	Profit
C	**Difference**	**€ 103**	**-0.231**	**0.085**	**0.058**	
	Economic Values		**€ -0.085**	**€ 0.96**	**€ 5.36**	
D	**Profit/Day**		**€ 0.02**	**€ 0.082**	**€ 0.308**	**€ 0.41**
	Profit/Lactation (305 day)		**€ 6**	**€ 24.89**	**€ 94**	**€ 125**

Based on information from the average daily yields:

1. Top EBI cows produced 0.23125 kg less milk carrier per day in their lifetime, generating a relative profit of +6 € /lactation (cost of transporting and processing milk is 0.085 € /kg).
2. Top EBI cows produced 0.085 kg more fat per day in their lifetime, generating a relative profit of +24.89 € /lactation (value of 1kg fat is € 0.96 after accounting for feed and quota costs).
3. Top EBI cows produced 0.0575 kg more protein per day, generating a relative profit of +94 € /lactation (value of 1kg protein is € 5.36 after accounting for feed costs).

4. On average each of the Top EBI cows had an increased profit per lactation of € 125. (ie.€ 125 * 8 Top EBI cows = € 1000 /lactation)

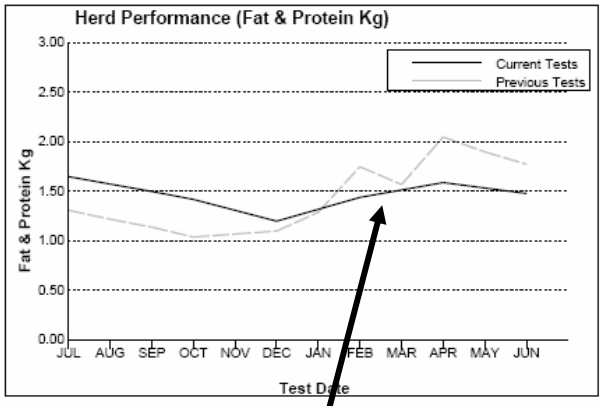
Profit differential displayed for each Herd

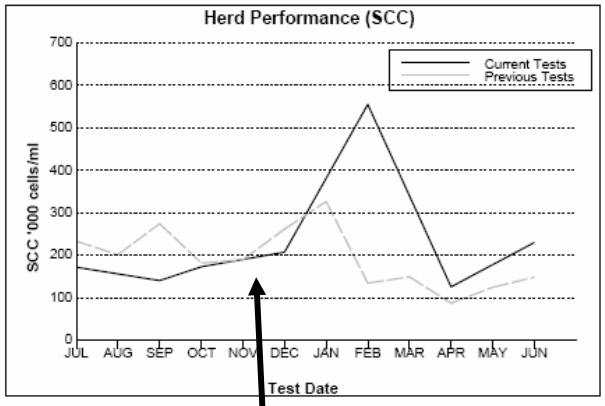
- ***Milk Recording Performance Report***

1. Production summaries

Group	Number of cows recorded	Average days in milk	Test Day / Yield to date / 305 day yield M Kg	M Gall	F%	P%	L%	F Kg	P Kg	Ave SCC Test>250 No. Treats	EBI (Euros)
Overall	**90**	**146**	**22.6**	**4.8**	**3.25**	**3.27**	**4.52**	**0.74**	**0.74**	**233**	**46**
			3553	759	3.16	3.14	4.67	112	112	17	
			6372	1361	3.37	3.28	4.66	215	209	5	
1st Lactation	**21**	**189**	**18.4**	**3.9**	**3.42**	**3.43**	**4.59**	**0.63**	**0.63**	**201**	**69**
			3908	835	3.34	3.26	4.74	130	127	1	
			5557	1187	3.43	3.35	4.74	191	186	0	
2nd Lactation	**10**	**212**	**20.8**	**4.4**	**2.96**	**3.26**	**4.46**	**0.61**	**0.68**	**319**	**19**
			5053	1079	3.08	3.10	4.60	155	157	3	
			6977	1490	3.16	3.17	4.62	221	221	2	
3rd Lactation	**22**	**119**	**24.6**	**5.3**	**3.17**	**3.17**	**4.51**	**0.78**	**0.78**	**274**	**29**
			3147	672	3.09	3.09	4.67	97	97	4	
			6618	1414	3.36	3.26	4.65	222	216	1	
4+ Lactation	**37**	**119**	**24.4**	**5.2**	**3.28**	**3.26**	**4.51**	**0.8**	**0.79**	**203**	**53**
			3187	681	3.13	3.10	4.65	100	99	9	
			6526	1394	3.40	3.28	4.64	222	214	2	
Dry Cows	**0**										

2. Comparative Herd Performance





3. Test day production history

Test date	Herd Performance 25-JUN'07	02-JUL'06	27-APR'07	23-FEB'07	28-DEC'06	30-OCT'06	05-OCT'06	03-SEP'06	31-JUL'06	02-JUL'06	31-MAY'06
Number of cows	90	83	82	39	48	72	74	75	83	83	83
Milk kg	22.6	23.8	26.3	22.7	18	15.9	19.5	19.5	22	23.8	28
Milk gallons	4.8	5.1	5.6	4.9	3.8	3.4	4.2	4.2	4.7	5.1	6
Total gallons	435	422	460	189	184	244	309	337	391	422	497
Fat %	3.25	3.59	2.89	3.33	3.44	3.83	3.65	3.78	3.44	3.59	3.44
Protein %	3.27	3.33	3.15	3.02	3.22	3.48	3.62	3.42	3.23	3.33	3.33
Lactose %	4.52	4.56	4.77	4.71	4.66	4.58	4.54	4.50	4.54	4.56	4.65
Fat kg	0.74	0.85	0.76	0.76	0.62	0.61	0.71	0.74	0.76	0.85	0.96
Protein kg	0.74	0.79	0.83	0.69	0.58	0.55	0.71	0.72	0.71	0.79	0.93
SCC	233	174	127	563	210	158	175	142	171	174	126

Herd Performance displayed graphically **Benchmark against Previous Milk Recordings**

- ***Milk Recording Quality Report***

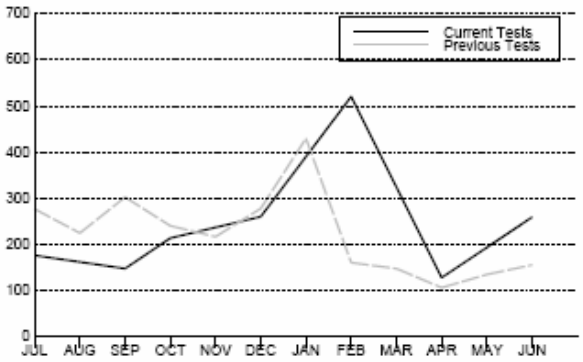
1. Summary

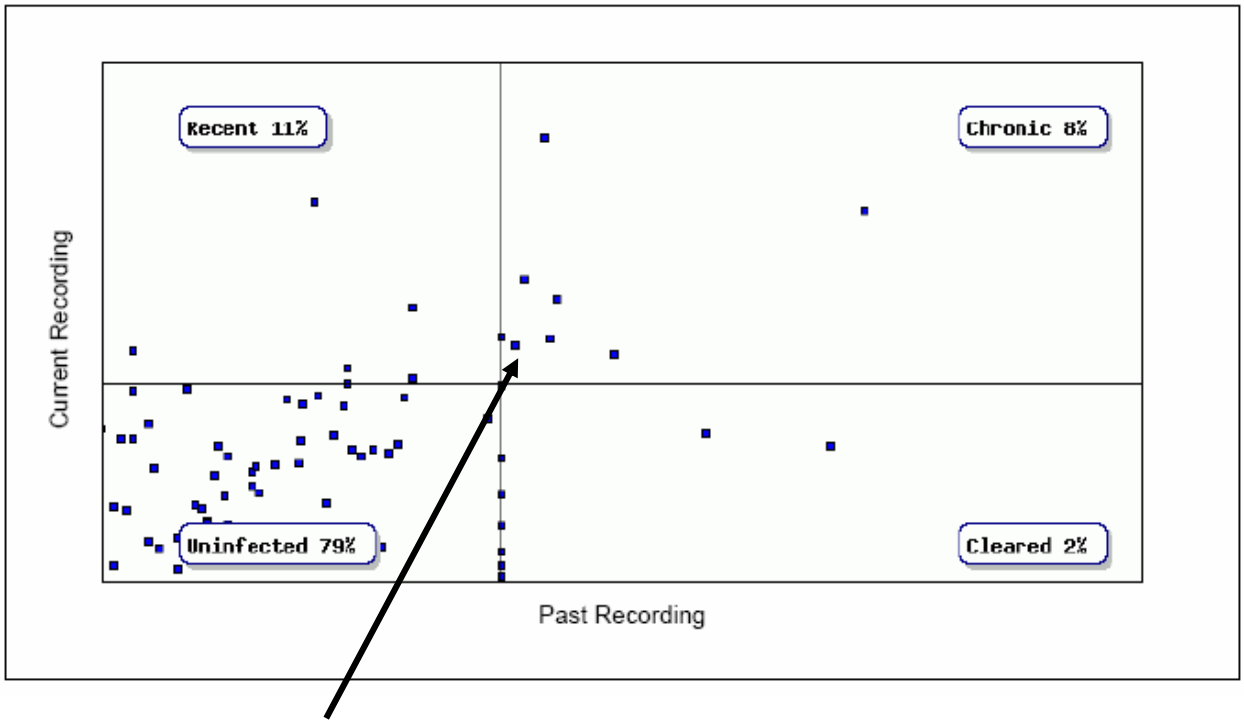
This report is a summary of the SCC data from your most recent milk recording *(from ICAR-approved milk recording organisations)*. The summary relates to the current lactation.

Current Test	
Test Details	
Date of milk recording	25-JUN-2007
Total cows recorded in milk	90
Average days in milk	146
Herd Performance	
Average daily milk yield (kg)	23
Average SCC ('000 cells/ml)	233
Median SCC ('000 cells /ml)	113

Since previous test	
No. of clinical cases	0
No. of affected cows	10

During current lactation	
Cumulative no. of clinical cases	5
Cumulative no. of affected cows	29





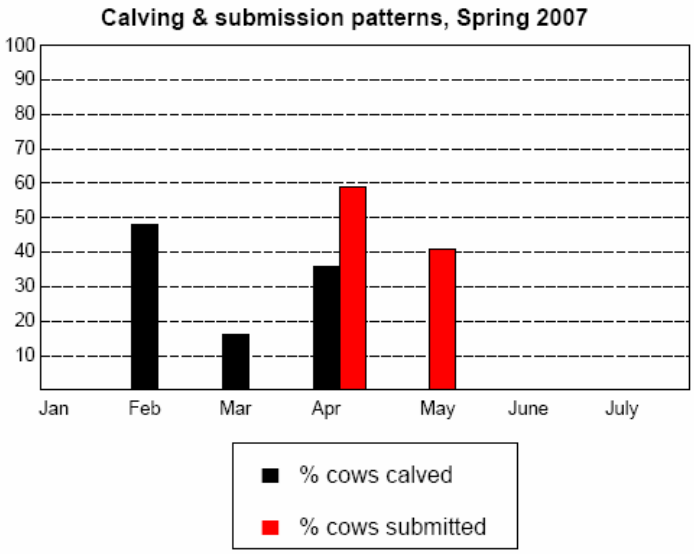
SCC distribution of the Herd displayed

- ***Herd Fertility Report***

1. Summary

This report is a summary of the reproductive performance of all cows that calved since **Jan 1st 2007** and are available for service during the current breeding season. Maiden heifers are not included. The data is based on information recorded in Animal Events, online, email packages and AI handhelds.

Calving	
Calving period	
Start	02/02/2007
Median	05/03/2007
Finish/Last calving	23/04/2007
Related events	
Total cows calved during the calving period	61
Calving interval (days)	373 days
% cows calved by 6 weeks	66%
Mating	
Mating Start Date (MSD)	17/04/2007
Cows calved and served within 21 days of MSD	26
Number of serves within 21 days of MSD	26



2. Herd Performance

The performance of your herd has been expressed relative to other recorded herds (with a minimum of 30 calvings)

			Btm 15%	Achievable	Top 15%
a. 21-day Submission rate (%) % of cows submitted for mating within 21 days of MSD, (26 cows) as a proportion of the herd calved up to 21 days after MSD (63 cows)	Your Herd	**41%**	*14%*		*60%*
	National Average	**40%**			
b. % cows calved > 30 days & not yet submitted % of cows calved > 30 days at MSD **(41 cows)** and not yet submitted within 21 days of MSD **(15 cows)**	Your Herd	**37%**	*66%*		*24%*
	National Average	**44%**			
c. % cows calved > 50 days & not yet submitted % of cows calved > 50 days at MSD **(29 cows)** and not yet submitted within 21 days of MSD **(7 cows)**	Your Herd	**24%**	*56%*		*17%*
	National Average	**36%**			

Fertility performance of herd can be benchmarked against National Average

4. Beef Farm Visit; David & Paula Johnson, Redcross.
4i. Copy of Boards for Farm Visit.

Farm Details

- Farm size; 101 ha (75 ha owned).
- 93 Suckler cows.
  - Autumn & Spring Calving.
- Breeding own replacements.
  - Charolais * Limousin cross-breds.
  - 3 bulls; 2 Charolais & 1 Limousin.
  - Exceptional record keeping.
- Suckler to beef system.
  - Steers finished at 24 months.
  - Heifers finished at 18-20 months.

Net Profit (€)

Criterion	This farm	Target
Stocking rate Lu/ha	1.52	
Kg Beef LW/Lu	382 kg	370 kg
Kg Beef LW/ha	579 kg	750 kg
Gross Output/ha	€928	€1,200
Variable Costs/ha	€450	€500
Gross Margin/ha	€478	€700
Fixed costs/ha	€352	€450
Net profit/ha	**€126**	**€200**

- Good farm profitability (top 10% of Suckler beef farms in Ireland).
  - Additional direct payments (~€500/ha).
- DP's; key element of Irish beef farming.

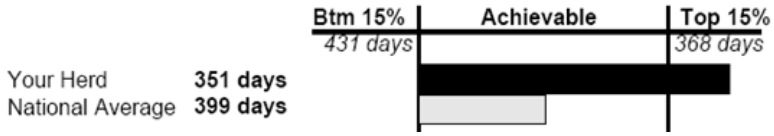
Increasing Profit

Criterion	SR + 0.4	c/Kg + 23
Stocking rate Lu/ha	1.9	As across
Kg Beef LW/Lu	382 kg	As across
Kg Beef LW/ha	726 kg	As across
Gross Output/ha	€1,163	€1,252
Variable Costs/ha	€500	As across
Gross Margin/ha	€663	€752
Fixed costs/ha	€352	As across
Net profit/ha	**€311**	**€400**

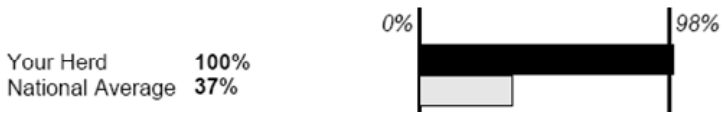
- Increasing profitability;
  - Increase in stocking rate (+€185/ha).
  - Increase in beef price (+€274/ha).
- ***Challenging times for beef farmers***

Calving

- 95 Calvings (27 heifer calvings);
  - Calving Interval = 351 days.
  - Cows not calved in period = 2 cows.
  - Calf mortality = 12%.
  - Calves per cow per year = 0.91 (~Top 20%).
- Excellent Calving Interval (med); 351 days.

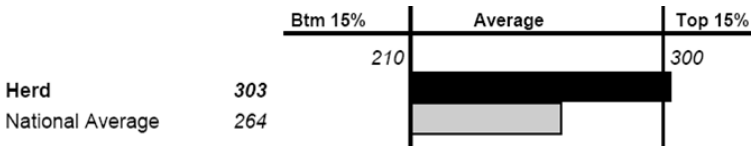


- Excellent Sire Recording; 100%



Beef Performance

- Excellent weanling performance;
  - 303 kg @ 218 days (1.2 kg/day).



- Excellent carcass performance;
  - Steers; 396 kg @ 22 mths (0.58 kg cwt/day).
  - Heifers; 199 kg @ 19 mths (0.52 kg cwt/day).

- Top class recording (& performance);
  - Calving, ancestry, weanling & carcass.

Breeding

- All replacements sourced from own herd.

Original herd = (Simm * beef) * Char or Lim

Heifer Progeny * Lim or Char

criss-cross

90% Pure Continental Beef Cows

(but not pure-bred)

- Heifers selected on basis of;
  - Calf growth rate (indicator of quality).
  - Calf conformation (quality).
  - Past steer performance from same mothers.
- Future; Beef €uro-Star Replacement Index.

€uro-Stars.

1. Main Stock Bull;
   - ULM ***** €125
   - Top 10% of CH breed.
2. Replacement Female.
   - Cow 274.
   - Replacement Index + performance.
3. Replacement females.
   - Progeny of ULM.
   - Range of AI-bred dams.
4. Limousin StockBull.
   - Low indexes….but…..very limited data.
   - ***Role of Interbeef.***

Summary

- Committed young beef farmer
- High profit focus (top 10%)
  - Net profit of €311/ha achievable (SR)
  - Dependency on beef price?
  - DP's; key element of Irish farming.
- Excellent record keeping.
  - Sires, weaning weights & factory data.
- Future; Focused on €uro-Star indexes to help increase profit.
- ***ICBF (& industry) must deliver.***

4ii. ICBF Breeding & Management Reports for this farm.

- ***€urostar Profit Index – Charolais Stockbull.***

BLAKESTOWN ULM **Breed: Charolais**

IE261077260400 **DOB: 02-Feb-2003** **Male**

Owner:David Johnson - Penrose House Redcross Village Co Wicklow

BLAKESTOWN SEIGNEUR	LUDWIG	INVINCIBLE
		UZES
	JOVIALE	ECRIN RJ
		AMBIANCE
3113 BLAKESTOWN NOISE (99F)	JET SET	PINOCHIO
		VODKA
	HARPIE	TYROL
		LENTILLE

€ uro-Star Rating (ICBF, Feb 2007)

Within Breed		Index	Data rel	Across Breed
★★★★★	Suckler Beef Value	€ 125	32%	★★★★★
	Beef Value			
★★★★★	Calving Traits	-€ 6	25%	★★★
★★	Weanling Export	€ 67	25%	★★★★
★★★★	Beef Carcass	€ 109	45%	★★★★★
	Replacement Value			
★★★	Milk & Fertility	-€ 60	7%	★
★★★★★	Calf Quality	€ 283	39%	★★★★★
	Other Key Traits			
★★★★	% Difficulty Calving	8.87%	49%	★★
	Docility	%	%	

Data Rel: 40 - 60% = Ave 20 - 40% = Below Ave <20% = Poor

Stars		Reliability	Suckler Beef Value €
*****	5 Stars = Excellent (Top 20%)	This figure varies between 0% & 100% and is **very important.** It shows how much information is behind the figures.	This figure combines all of the indexes below into an **overall profit index**. On average progeny from this Bull will leave **€117** more than the average commercail beef calf
****	4 Stars = Above Average		
***	3 Stars = Average		
**	2 Stars = Below Average		
*	1 Star = Poor (Bottom 20%)		

5 Star Bull for 'Suckler Beef Value'
French Charolais Sire

Easy Calving & Good Maternal Traits
French Charolais Dam

Progeny Distribution					
2005		**2006**		**2007**	
39 Calves		49 Calves		41 Calves	
Male	**Female**	**Male**	**Female**	**Male**	**Female**
17	22	25	24	23	18

129 progeny to-date.

- ***€urostar Profit Index – Charolais Cow '274'***

Breed: Charolais

IE371275730274 DOB: 14-Oct-2002 Female

Owner:David Johnson - Penrose House Redcross Village Co Wicklow

GROVE ENTERPRISE	BRAMPTON ACE	PARSONAGE NEBULUS
		BRAMPTON PEARL
	GROVE BEAUTY	GROVE VALMONT
		GROVE UNISON
IEFJPQ0062W	ENFIELD HARA KIRI	EXTRA
		ALPINE
	YJA417849	

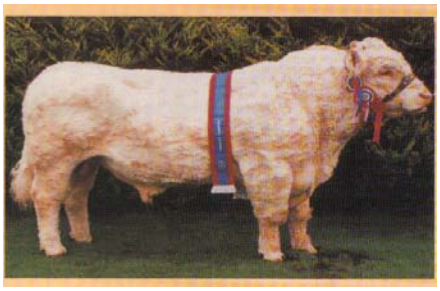
€uro-Star Rating (ICBF, Feb 2007)

Within Breed		Index	Data rel	Across Breed
★★	Suckler Beef Value	€ 95	19%	★★★★
	Beef Value			
★★★	Calving Traits	-€ 14	14%	★
★★	Weanling Export	€ 65	26%	★★★★
★★	Beef Carcass	€ 88	22%	★★★★
	Replacement Value			
★★★★★	Milk & Fertility	-€ 15	16%	★★
★★	Calf Quality	€ 193	23%	★★★★
	Other Key Traits			
★★★	% Difficulty Calving	10.05%	17%	★
	Docility	%	%	

5 Star Cow for 'Milk & Fertility' **Good potential for breeding profitable weanlings**

Calved	Sex	Breed	Tag
14/03/05	**Female**	**LM**	IE381043540533
04/03/06	**Female**	**CH**	IE381043530623
09/02/07	**Female**	**CH**	IE381043530706

UK Charolais Sire



Name: Grove Enterprise

ITB: CHL**GBR**M000MF0036134

French Charolais Maternal Grand Sire

Name: Enfield Hara Kiri

ITB:CHL**FRA**M008592106619

- ***Replacement Females***

Replacement Females					
Animal ID	**DOB**	**Sire ID**	**Dam ID**	**Milk & Fertility**	
				Stars	Rel%
IE381043580**603** CH 50% LM 25% SI 18%	09-Dec-05	IE261077260400	IE381043510233 **Sire: Ulysses (AI)**	*****	**11%**
IE381043520**606** CH 72%	24-Dec-05	IE261077260400	IEFHTW0087B	*****	**2%**
IE381043580**611** CH 56% LM 25% SI 12%	06-Jan-06	IE261077260400	IE381043510183 **Sire: C.Bertie (AI)**	*****	**6%**
IE381043560**618** CH 62% BB 22%	23-Feb-06	IE261077260400	IE381156490431 **Sire: Furbo (AI)**	****	**3%**
IE381043530**623** CH 87% SI 9%	04-Mar-06	IE261077260400	IE371275730274 **Sire: G Enterprise (AI)**	****	**10%**

Similar Age Group

Sired by 5 Star 'Suckler Beef Value' Sire

AI Maternal Grandsires

Name: Ulysse
ITB: LMS**FRA**M003683001518

Muscle	Skeletal	Milk & Fertility
122	94	*****

Muscle	Skeletal	Overall Maternal
109	97	**115**

Excellent Agreement between Irish & French Evaluations

- ***€uostar Profit Index – Limousin Stockbull***

Outcross Backpedigree – Danish StockBulls **Low Reliability**

BALLYNERRIN AMADEUS **Breed: Limousin**

IE381160250051 **DOB: 03-Oct-2005** **Male**

Owner:David Johnson - Penrose House Redcross Village Co Wicklow

RYDE REGENT	FESTIN	CHOUCHOU
		ATTICA
	RYDE LIMOGES	HOLLANDS
		RYDE GALIA
TURQUOISE	HAMMEL LUC	GOLIATH
		ETHRA
	PETULA	LUPIN
		HACHETTE

€uro-Star Rating (ICBF, Feb 2007)

Within Breed		Index	Data rel	Across Breed
★★	Suckler Beef Value	€ 68	5%	★★
	Beef Value			
★★★★★	Calving Traits	-€ 3	3%	★★★★
★★	Weanling Export	€ 52	9%	★★★
★	Beef Carcass	€ 53	7%	★★
	Replacement Value			
★	Milk & Fertility	€ 1	2%	★★★
★★	Calf Quality	€ 127	7%	★★★
	Other Key Traits			
★★★★★	% Difficulty Calving	4.47%	5%	★★★★
	Docility	%	%	

Name: Ryde-Regent
ITB: LMS**DNK**M005706500403

Name: Festin
ITB: LMS**FRA**M008790005718

Name: Hammel Luc
ITB: MS**DNK**M006446700592

- ***Weanling Performance***

ICBF Weanling Performance Herd Report (13th Aug 2007)

Weanling Males

Calf ID	Sex	Main Breed	DOB	Sire ID	Dam ID	Weight (kg)	Age (days)	Gain (kg/day)	Loin Dev (1-15)	Dev HQ (1 15)
IE381043540**707** CH 63% BB 22%	Male	Charolais	10-Feb-07	IE261077260400	IE381156490431	**344**	184	**1.7**	**6**	**7**
IE381043550**716** CH 50% LM 34% SI 13%	Male	Charolais	28-Feb-07	IE261077260400	IE381043570429	**270**	166	**1.4**	**7**	**8**
IE381043560**717** CH 50% LM 38% AA 9%	Male	Charolais	16-Mar-07	IE261077260400	IE381053190284	**268**	150	**1.5**	**7**	**8**
IE381043570**718** CH 63% LM 25% SI 9%	Male	Charolais	22-Mar-07	IE261077260400	IE381043510290	**256**	144	**1.5**	**6**	**8**
IE381043530**722** CH 69% LM 25%	Male	Charolais	08-Apr-07	IE261077260400	IE381156440484	**238**	127	**1.6**	**7**	**8**
					Average	**275 Kgs**	154	**1.54 Kg/day**	**7**	**8**

Weanling Females

Calf ID	Sex	Main Breed	DOB	Sire ID	Dam ID	Weight (kg)	Age (days)	Gain (kg/day)	Loin Dev (1-15)	Dev HQ (1 15)
IE381043550**699** CH 72% LM 19%	Female	Charolais	31-Jan-07	IE261077260400	IE371442280197	**319**	194	**1.4**	**7**	**7**
IE381043580**702** CH 91%	Female	Charolais	06-Feb-07	IE261077260400	IE371413040337	**290**	188	**1.3**	**6**	**7**
IE381043510**704** CH 50% LM 41%	Female	Charolais	08-Feb-07	IE261077260400	IE381021840180	**277**	186	**1.3**	**6**	**7**
IE381043520**705** CH 53% LM 38% SI 6%	Female	Charolais	08-Feb-07	IE261077260400	IE381043570370	**275**	186	**1.3**	**7**	**7**
IE381043530**706** CH 88% SI 9%	Female	Charolais	09-Feb-07	IE261077260400	IE371275730274	**298**	185	**1.4**	**6**	**7**
IE381043550**708** CH 59% LM 22% HE 13%	Female	Charolais	11-Feb-07	IE261077260400	IE381080220321	**309**	183	**1.5**	**7**	**7**
					Average	**295 Kgs**	187	**1.36 Kg/day**	**7**	**7**

Identify most Profitable Sires & Dams to Breed from

Identify most Profitable Weanlings

- ***Calving Performance***

Excellent Calving Interval (48 days better than National Average)

1. Summary Data

Report is based on beef cows with a calving record in the cattle breeding database and where the calving date is between 01/07/2006 and 30/06/2007

	All	Heifers
Total Calvings	95	27
No. of Calves - Live at Birth	86	20
No. Calves - Dead at Birth	12	9
No. Male Calves - Live at Birth	41	7
No. Female Calves - Live at Birth	45	13

	All	
No. of Cows not calved	2	
No. of Calves - Live at 28 days	85	
	Cows	Heifers
Average age at calving	6y 0m	2y 1m

2. Performance Statistics - relative to all beef herds in the database

Herd figures are expressed relative to all beef herds in the database, where the herd has a minimum of 10 calvings during the calving period.

			Btm 15%	Achievable	Top 15%
			431 days		368 days
1. Calving Interval (days) Median Calving Interval between most recent and previous calving date (if available), for cows with a calving record during the period.	Your Herd	351 days			
	National Average	399 days			
2. Mortality - Dead at Birth (%) Number of calves born dead expressed as a proportion of all calf births recorded during the period.	Your Herd	12.2%	3%		0%
	National Average	1.2%			
3. Mortality - Dead at 28 Days (%) Number of calves born dead or dead within 28 days, expressed as a proportion of all calf births recorded during the period.	Your Herd	13.3%	6%		0%
	National Average	2.3%			
4. Cows not calved in Period (%) Number of cows not calved during the period, expressed as a proportion of all eligible females in the herd.	Your Herd	2%	40%		0%
	National Average	10%			
5. Calves per cow per year * Number of calves per cow per year, expressed as a proportion of all eligible females in the herd.	Your Herd	0.91	0.4		0.9
	National Average	0.8			
6. Births with known sire (%) Number of births with a known sire (valid in database), expressed as a proportion of all calf births recorded during the period.	Your Herd	100%	0%		98%
	National Average	37%			
7. Births with calving survey data (%) Number of births with calving survey data, expressed as a proportion of all calf births recorded during the period.	Your Herd	98%	0%		95%
	National Average	31%			
8. Average no. of calvings per cow Average number of calvings per cow	Your Herd	3.8	6.3		3.1
	National Average	4.1			

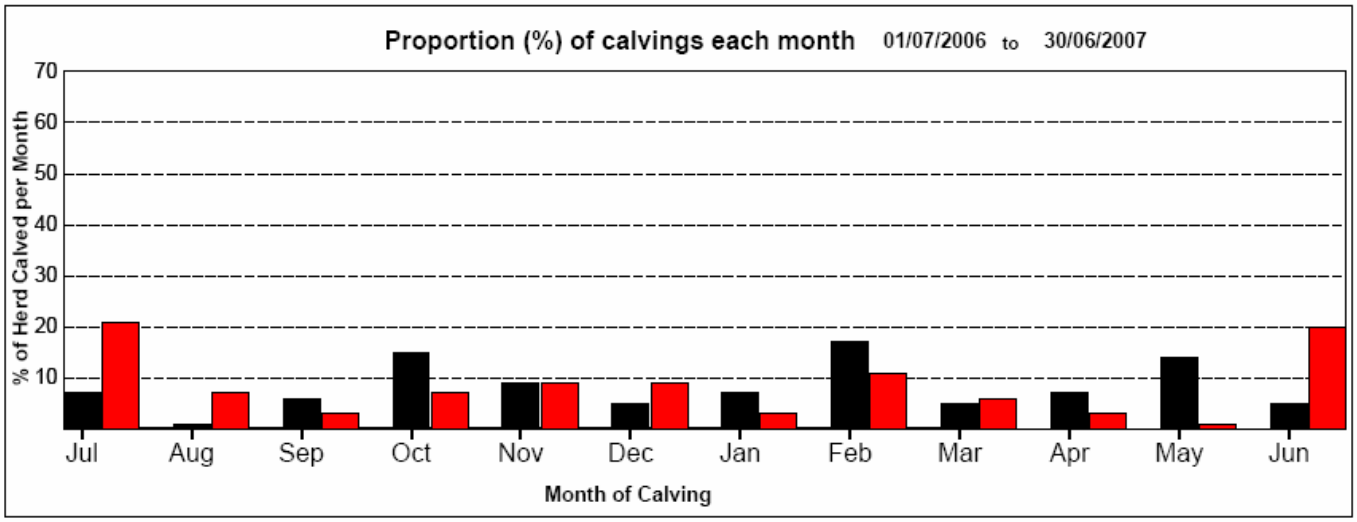
Explanatory Notes

Performance statistics for your herd are expressed relative to all beef herds in the ICBF database, where the herd has a minimum of 10 calvings during the period. For example, the calving interval for your herd was 351 days .This compares to 399 days for the average of all herds and 368 days for the top 15% of herds (see bar-chart).

* Calves per cow per year = 365/calving interval x no. of live calves at 28 days / total number of cows eligible to calve.

Excellent use of ICBF Animal Events system

Sire's of calves extremely well recorded



Month	No. Calved	% Calved	Month	No. Calved	% Calved
Jul	7	7	Jan	7	7
Aug	1	1	Feb	16	17
Sep	6	6	Mar	5	5
Oct	14	15	Apr	7	7
Nov	9	9	May	13	14
Dec	5	5	Jun	5	5

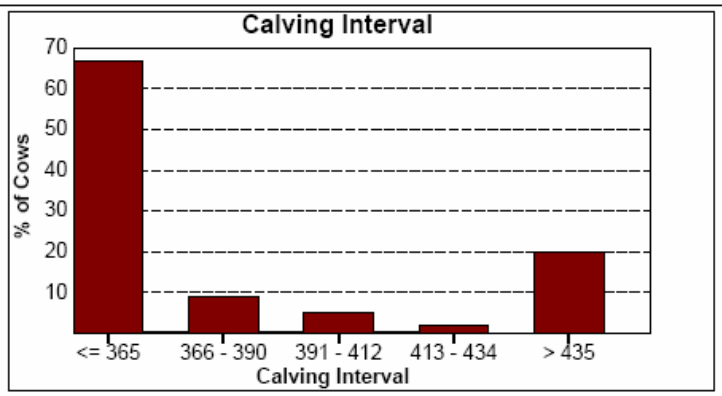
Current years data

Last years data

4. Additional Information

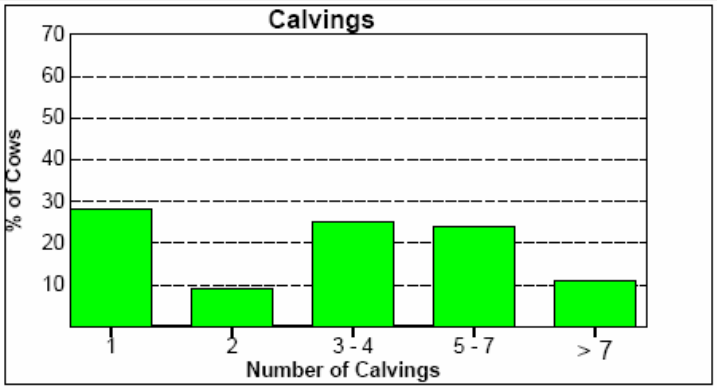
A. Calving Interval

Calving Interval	No. Calved	% Calved
% Cows calved <= 365 days	44	67
% Cows calved 366 - 390 days	6	9
% Cows calved 391 - 412 days	3	5
% Cows calved 413 - 434 days	1	2
% Cows calved > 435 days	13	20



B. Number of Calvings

Calvings	No. cows	% of cows
1st Calving	27	28
2nd Calving	9	9
3rd - 4th Calving	24	25
5th - 7th Calving	23	24
> 7th Calving	10	11



- ***Beef Carcass – Summary Report***

Overall Summary - relative to all beef steers, progeny of suckler beef cows, slaughtered in the period 1st Jan 2006 - 31st Dec 2006.

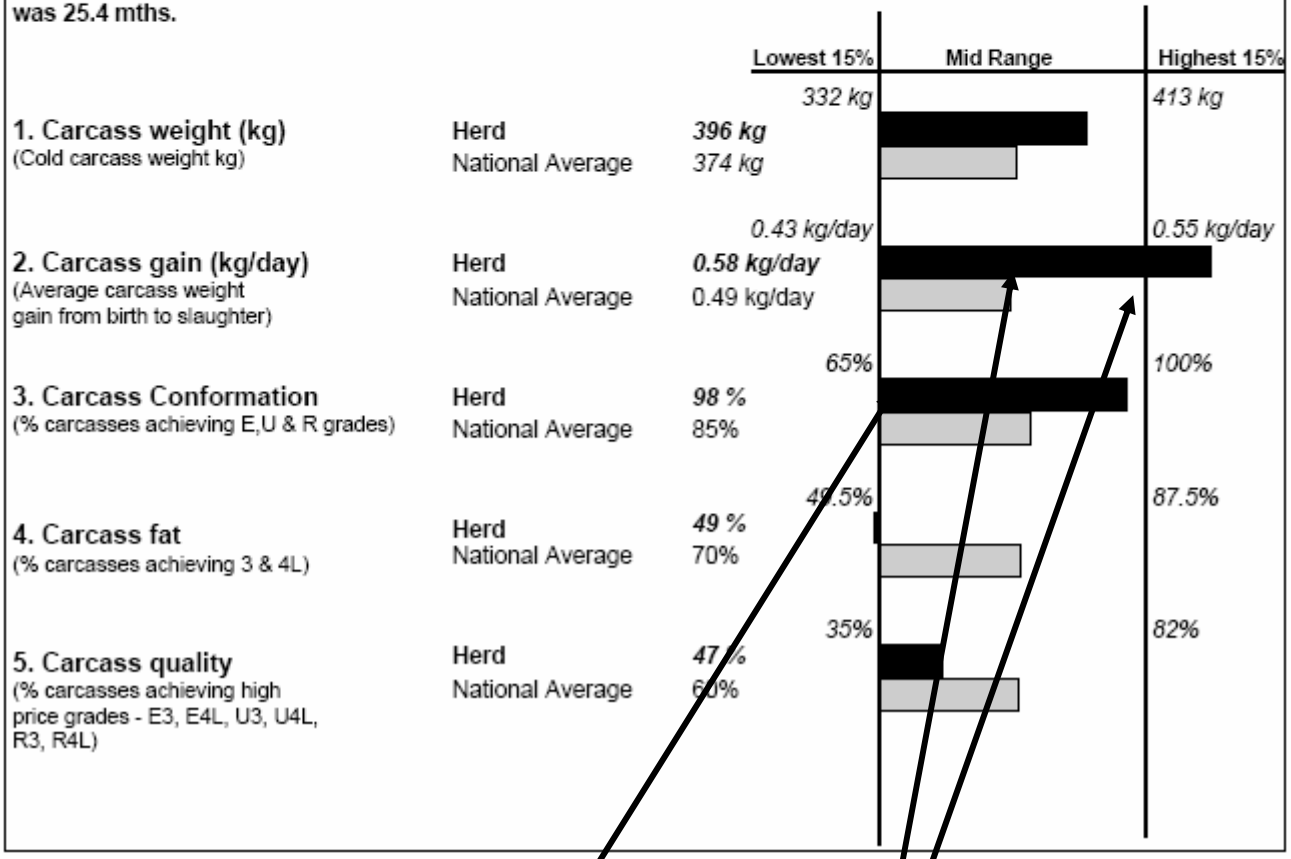
i. Farm & slaughter details

Total steers slaughtered	43
Average age at slaughter	22.4 mths
Start slaughter date	17-Jan-2006
Range in age at slaughter	18 - 29 mths
End slaughter date	03-May-2006
Beef Cows	82

ii. Carcass breakdown

	E	U	R	O	P	Total
1						0
2		1				1
3		6	6	1		13
4L		4	4			8
4		3	9			12
4H		4	5			9
5						0
Total	0	18	24	1	0	43

Slaughter Statistics - relative to all beef steers slaughtered in period. National summary statistics are based on 834 herds with more than 10 steers slaughtered during the period. Average age at slaughter for these animals was 25.4 mths.



94% of Carcasses achieving E&U Grades

Herd average for 'Carcass Gain' & 'Carcass Quality' well above national average