

Evaluating the impact of the Supply of Extended Warranties on Domestic Electrical Goods Order 2005

Annexes

October 2008

OFT1024annexes

A MAIN PROVISIONS OF THE ORDER

Para.	Order Provision	Anticipated impact
3(1)a	Display price and duration of extended warranty next to price of DEG	Improve the ability of customers to compare competing offers.
3(1)b	Provide leaflets which contain further relevant information	Ensures customers have access to the relevant information to make an informed decision.
3(1)c,7	Provide a written quotation that is valid for 30 days (on extended warranties costing over £20)	Allows customers to shop around before purchasing at point-of-sale.
4,5,6	Advertise price of extended warranty in advertisements, catalogues, and websites	Improve the ability of customers to compare competing offers.
8(1)a	Allow a cancellation period of 45 days, during which the customer will get a full refund (on extended warranties lasting over one year)	Allow customers to switch to alternative suppliers before becoming 'locked in', and to reverse poor decisions.
8(1)b	Allow a customer to terminate the extended warranty at any time and receive a pro-rata refund (on extended warranties lasting over one year)	Allow customers to switch to alternative suppliers before becoming 'locked in', and to reverse poor decisions.
8(1)c	Give customers a written reminder of their right to cancel or terminate the extended warranty (on extended warranties costing over £20 and lasting over one year)	Ensures customers are aware of their rights.

B CONSUMER SURVEY SUMMARY

- B.1 We commissioned Marketing Sciences to conduct a consumer survey. The purpose of the consumer survey was to find out how and to what extent the Order had impacted consumer shopping behaviour and test consumers' awareness of their rights.
- B.2 Marketing Sciences conducted the consumer survey as part of an Omnibus survey. Marketing Sciences completed the survey in two waves on 18-20 January 2008 and 25-27 January 2007. The consumer survey results are based on interviews with 2012 adults aged 18 or older.

Q.1: Which of the following Domestic Electrical Goods have you personally been involved in buying in the last 12 months?

BASE: All respondents

WEIGHTING: Demographic only

	%
Colour TV	27
Video or DVD player or recorder	24
PC/Laptop	21
Games console	21
CD player, Hi-Fi, or personal stereo	20
Vacuum cleaner	20
Camera/Camcorder	19
Washing machine/Tumble dryer	19
Fridge, freezer or combined fridge/freezer	16
Microwave	15
Cooker	11
Dishwasher	7
None of these	25

Q.2: On which of the following products have you purchased an extended warranty in the last 12 months?

BASE: All respondents who have bought any Domestic Electric Goods in the last 12 months

WEIGHTING: Demographic only

	%
Colour TV	8
Washing machine/Tumble dryer	6
PC/Laptop	6
Games console	4
Video or DVD player or recorder	4
Fridge, freezer or combined fridge/freezer	4
Cooker	4
Camera/Camcorder	3
CD player, Hi-Fi, or personal stereo	3
Vacuum cleaner	3
Microwave	3
Dishwasher	1
None of these	73

Q.3: How did you buy the <DEG>?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
By visiting a shop	72
Over the internet	17
From a catalogue by phone	2
By phoning a shop	2
From a catalogue by post	2
Other	4
Don't know	1

Q.4: From which retailer did you purchase the <DEG> ?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Curry's	16
Argos	11
Comet	10
Local/Independent store	6
Tesco	4
PC World	3
Asda	3
John Lewis	3
Game	2
Dixons	2
Dell	1
Sainsbury	1
Co-operative (Co-op)	1
Littlewoods	1
Jessops	1
GameStation	1
Apple	1
Richer Sounds	1
MFI	< 1
Sony	< 1
Morrison	< 1
House of Fraser	< 1
Sevenoaks Sound and Vision	< 1
Miller Brothers	< 1
Debenhams	< 1
Scottish Power	< 1
Other	23
Don't know	11

Q.5: When do you think you can take out an 'extended warranty' for electrical products?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Only at the time that you buy an electrical product	26
At any time within one month from purchasing the product, but not afterwards	12
Any time before the manufacturer's guarantee expires, but not afterwards	23
Only after the manufacturer's guarantee has expired	7
At any time	17
Other	4
Don't know	12

Q.6: When you made the purchase of the <DEG>, did you see any leaflets about extended warranties in the store?

BASE: All answering who bought in-store

WEIGHTING: Reweighted by purchase proportions

	%
Yes	46
No	49
Don't know	5

Q.7: How helpful did you find the leaflet in deciding whether you needed an extended warranty?

BASE: All answering who bought in-store and saw leaflets about extended warranties in store

WEIGHTING: Reweighted by purchase proportions

	%
Very helpful	20
Somewhat helpful	29
Unhelpful	23
Did not read it	26
Don't know	2

Q.8: Were both the price and duration of the extended warranty displayed next to the price of the appliance that you purchased?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Yes	34
No	34
No, didn't see a price displayed (e.g. rang up)	8
Don't know/can't remember	23

Q.9: Was the information about the price and duration helpful in deciding whether to take out an extended warranty?

BASE: All answering who saw both the price and duration of the extended warranty displayed next to the price of the appliance

WEIGHTING: Reweighted by purchase proportions

	%
Yes	65
No	32
Don't know	3

Q.10: When did you purchase the extended warranty for the <DEG>?

BASE: All answering who purchased extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
At the time of purchasing the appliance	81
Some time after you purchased the appliance	14
Don't know	5

Q.11: Where did you obtain the extended warranty from?

BASE: All answering who purchased extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
The same retailer as sold product	68
The manufacturer of the product	17
An insurance company	6
Bank	2
Finance company	1
Credit card scheme	< 1
Somewhere else	2
Don't know	4

Q.12: Did you compare the extended warranty from the retailer of the appliance with those of other suppliers of extended warranties?

BASE: All answering who purchased extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
Yes	15
No	78
No, didn't know there were other suppliers	4
Don't know	3

Q.13: What prompted you to compare the extended warranty offered by the retailer against the extended warranty from other suppliers?

BASE: All answering who compared extended warranties

WEIGHTING: Reweighted by purchase proportions

	%
Seeing the price and duration of the extended warranties next to the appliance	51
Salesperson mentioned there were other suppliers	40
Leaflet saying there were other suppliers	26
Another reason	24
Don't know	5

Q.14: Before purchasing the extended warranty did you receive a written quotation of the cost of the warranty from the retailer?

BASE: All answering who purchased extended warranty and purchased in-store

WEIGHTING: Reweighted by purchase proportions

	%
Yes	48
No	48
Don't know	4

Q.15: When you received the written quotation, was it clear that you could use it at a later date to buy the warranty at the same price?

BASE: All answering who received a written quotation

WEIGHTING: Reweighted by purchase proportions

	%
Yes	45
No	38
Don't know	17

Q.16: How long after you purchased the extended warranty could you have cancelled it and received a full refund, if at all?

BASE: All answering who purchased extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
None (can't get a refund)	9
Up to a week	10
Up to a month	35
Up to 45 days	3
Up to 2 months	3
Over 2 months	7
Don't know period, but can get a refund	13
Don't know if can get a refund	20

Q.17: After taking out your extended warranty, did you receive a reminder in the post of your right to cancel the extended warranty?

BASE: All answering who purchased extended warranty that could have been refunded

WEIGHTING: Reweighted by purchase proportions

	%
Yes	47
No	41
Don't know	12

Q.18: In the past three years, have you cancelled an extended warranty within 45 days of purchasing it and received a full refund?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Yes	2
No	97
Don't know	< 1

Q.19: If you were to terminate your extended warranty AFTER 45 days has passed but before the contract ends, what proportion of the total amount payable during the contract do you think you would receive as a refund?

BASE: All answering who purchased extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
No refund	17
All/Full refund	15
Some of it – in proportion to the time left to run (pro rata)	14
Some of it – unspecified, or specified but not in proportion to the time left to run (pro rata)	8
Don't know	46

Q.20: In the past 3 years, have you terminated an extended warranty AFTER 45 days has passed but before the contract ends?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Yes	2
No	97
Don't know	1

Q.21: In the last 3 years, have you claimed on an extended warranty policy for an electrical appliance which broke down?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Yes	10
No	90
Don't know	< 1

Q.22: How satisfied were you with the speed which the repairs were arranged and completed (or the replacement received) on this occasion?

BASE: All answering who have claimed on an extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
Very satisfied	52
Fairly satisfied	30
Not very satisfied	7
Not at all satisfied	11

Q.23: How satisfied were you with the repairs themselves (replacement itself)?

BASE: All answering who have claimed on an extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
Very satisfied	53
Fairly satisfied	29
Not very satisfied	5
Not at all satisfied	12
Don't know	1

Q.24: Why did you decide to take an extended warranty for the <DEG>?

BASE: All answering who purchased extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
I think this type of product is likely to break down	19
Costs of repairs are likely to be high	13
Past experience of product failure	11
For peace of mind	9
Product is too essential to lose	8
I always take extended warranties	6
Convenience – hassle of repairs / sending things back	6
Repairs more likely to be effective	6
Product expensive to replace	5
Sales staff advice	3
Reasonable price	3
The product relies on rapidly evolving technology so risks unknown	3
Product will be used heavily or in a hostile environment	2
Aspects such as theft and accidental damage are important to me	1
Link to credit deal	1
Product discount if extended warranty purchased	1
Budgeting – fixed cost / no surprises	1
Nothing to lose as full refund if no claims are made	< 1
Other	28
Don't know	5

Q.25: Why did you decide not to buy an extended warranty?

BASE: All answering who didn't purchase extended warranty

WEIGHTING: Reweighted by purchase proportions

	%
Too expensive	39
Warranty not essential	19
Cost of repairs likely to be smaller than cost of extended warranty	11
Products are more reliable nowadays	7
I would replace this product for upgraded versions anyway	4
Prefer to take a chance	3
Have some cover under household insurance	3
If product breaks down manufacturers have an obligation to repair it	3
Negative experience with an extended warranty before	2
Extended warranty only available for a limited term	1
Pushy salesperson (or other negative comments regarding salesperson)	< 1
Other	29
Don't know	5

Q.26: Before deciding whether or not to purchase an extended warranty, did you look into the reliability of the type of the <DEG> you bought?

BASE: All answering

WEIGHTING: Reweighted by purchase proportions

	%
Yes	50
No	47
Don't know/can't remember	2

C MYSTERY SHOPPER SUMMARY

In-store mystery shopper exercise summary

- C.1 We commissioned Marketing Sciences to conduct an in-store mystery shopper exercise. The purpose of the mystery shopper exercise was to identify the information about extended warranties that retailers provide. This includes the extent to which retailers display extended warranty price and duration information next to the products, whether information leaflets are available, whether written quotations are provided, and whether sales assistants were providing correct information.
- C.2 Marketing Sciences conducted the mystery shopper exercise on 12-19 January 2008. One hundred stores selling DEGs were selected, broadly based around market share and located throughout the UK. In each store the mystery shopper was asked to browse 3-4 product areas. In total 302 DEG product areas were visited. The mystery shopper was then asked to engage a sales assistant about a specific product, and ask a series of questions that relate to the provisions of the Order.

Store location

	No. of stores visited
Glasgow	10
Newcastle/Gateshead	10
Manchester	10
Walsall	9
Nottingham	11
Bristol	10
Plymouth	10
Romford	9
Kingston-upon-Thames	9
Southampton	9
Dunblane	1
Havant	2
Total	100

Stores visited

	No. of stores visited
Independent (eg Euronics, Sirius Group)	10
Argos Extra /Argos.co.uk	5
Games	5
Asda	10
Curry's Digital (Ex-Dixons – DSG)	10
Curry's Superstores (DSG)	10
The Jessop Group	8
Comet (KESA)	10
MFI	5
PC World (DSG)	9
Sony	3
Tesco (Extra), Tesco Direct	5
Sevenoaks Sound and Vision	2
Richer Sounds	2
Hughes	2
John Lewis	2
Scottish Hydro Electric PLC	2
Total	100

Q1: Area of store browsed

BASE: All areas

	No. of areas
TV	38
Camera	38
PC/Laptop	31
Vacuum	30
Video or DVD	30
Fridge/freezer	22
Games console	25
Microwave	23
Washing machine/dryer	17
Stereo	17
Cooker	12
Dishwasher	10
Scanner and printers	9
Total	302

Q2: Proportion of products clearly showing duration of extended warranty

BASE: All areas

	%
All	31
Over 75%	12
50-75%	5
Less than 50%	7
None	45

Q3: Proportion of products clearly showing price of extended warranty

BASE: All areas

	%
All	35
Over 75%	11
50-75%	5
Less than 50%	6
None	43

Q4: Proportion of products showing that extended warranty applied to a range

BASE: All areas

	%
All	31
Over 75%	7
50-75%	3
Less than 50%	7
None	44
Not applicable	8

BASE: All areas where price and duration not shown by product

	%
All	10
Over 75%	8
50-75%	4
Less than 50%	10
None	62
Not applicable	6

Q5: Proportion of products clearly showing extended warranty is optional

BASE: All areas

	%
All	36
Over 75%	6
50-75%	3
Less than 50%	8
None	47

Q5.1: Whether extended warranty information leaflets were clearly displayed

BASE: All stores

	%
Yes	47
No	53

Q5.2: Where leaflets in store were found

BASE: Stores with extended warranty leaflets

	%
Next to the goods in question	26
On the till	30
In a display stand near the goods in question	47
In a display stand somewhere else	19
At the customer service desk	4
Pinned to a wall by or near product	2
Flat next to till	2
On salesperson desks	2

Q5.3: Whether can see an empty extended warranty stand

BASE: Stores where cannot see extended warranty leaflet

	%
Yes	2
No	98

Q6: Area of store 'bought' from

BASE: All stores

	No. of areas
TV	13
Camera	13
PC/Laptop	11
Vacuum	10
Video or DVD	10
Fridge/freezer	7
Games console	8
Microwave	7
Washing machine/dryer	6
Stereo	5
Cooker	5
Dishwasher	3
Scanner and printers	2
Total	100

Q6.1: Whether assistant mentioned that extended warranty was available

BASE: All stores

	%
Yes	79
No	12
Don't know	9

Q6.2: Whether extended warranty was mentioned before or after prompting

BASE: Those where assistant said Extended Warranty available

	%
Before	18
After	82

Q6.3: Whether assistant provided leaflet about extended warranty

BASE: Those where assistant said Extended Warranty available

	%
Yes	65
No	35

Q6.4: Whether leaflet was mentioned before or after prompting

BASE: Those which provided an Extended Warranty leaflet

	%
Before	25
After	75

Q6.5: Answer to question: If I buy the extended warranty, can I change my mind later and get my money back?

BASE: All stores where Extended Warranty available

	%
Yes	68
No	24
Don't know	8

Q6.5: Answer to question: Can I buy an extended warranty elsewhere, instead of buying this one?

BASE: All stores where Extended Warranty available

	%
Yes	54
No	34
Don't know	11

Q6.5: Answer to question: If I want to think about it first, can I get the extended warranty later at the same price?

BASE: All stores where Extended Warranty available

	%
Yes	76
No	18
Don't know	6

Q6.6: Whether assistant provided a written quotation for the price and duration of the extended warranty which was valid for at least 30 days

BASE: All stores where assistant said Extended Warranty available

	%
Yes	32
No	68

Q6.7: Reasons for not providing a written quotation for the price and duration of the extended warranty which was valid for at least 30 days

BASE: Those who did not provide a written quotation

	%
All info in leaflet/gave leaflet instead	37
Showed where information was in leaflet	7
Price of warranty is below the price of the product	6
Fixed price	4
Told it is 10% of purchase price for 5 years	4
Told warranty was same price as product	2
Had to write details myself	4
Do not / unable to provide quotes	9
Do not hold product in stock	2
Sent out later by post	2
Done at the point of sale	4
Explained about the cover	2
Was unable to print info from computer	2
Extended warranty included in price of product	4
Assistant did not know enough about it	2
Can stop warranty at any point	2
Not prepared to give quote unless product is purchased	2
Unable to give quote unless product is purchased	7
Told all info was on website	2
Staff unhelpful / not interested in writing quote	2
Staff did not offer to provide quotation	6
Had no leaflets with details	2

Online mystery shopper summary

- C.3 We commissioned Marketing Sciences to conduct an online mystery shopper exercise. The purpose of the online mystery shopper exercise was the same as for the in-store mystery shopper exercise: to identify the information that retailers provide about extended warranties.
- C.4 Marketing Sciences conducted the exercise on 28-30 January 2008. The websites of 14 online DEG suppliers were selected. The mystery shopper browsed 3-4 DEG product areas on each website. In total, 50 DEG product areas were viewed.

Websites visited

	No. of visits
Argos Extra /Argos.co.uk	1
Dixons (DSG)	1
Curry's (DSG)	1
The Jessop Group	1
Comet (KESA)	1
PC World (DSG)	1
Tesco (Extra), Tesco Direct	1
Richer Sounds	1
Hughes	1
John Lewis	1
Scottish Hydro Electrical PLC	1
Littlewoods	1
DABS	1
Co-op	1
Total	14

Q1: Area of store browsed

BASE: All areas

	No. of areas
TV	6
Camera	5
PC/Laptop	4
Vacuum	5
Video or DVD	3
Fridge/freezer	3
Games console	5
Microwave	4
Washing machine/dryer	3
Stereo	6
Cooker	3
Dishwasher	3
Total	50

Q2: Proportion of products clearly showing duration of extended warranty

BASE: All areas

	%
All	66
50-75%	4
Less than 50%	10
None	20

Q3: Proportion of products clearly showing price of extended warranty

BASE: All areas

	%
All	66
50-75%	4
Less than 50%	10
None	20

Q4: Proportion of products showing that extended warranty applied to a range

BASE: All areas

	%
All	4
50-75%	2
Less than 50%	6
None	16
Not applicable	72

Q5: Proportion of products clearly showing extended warranty is optional

BASE: All areas

	%
All	66
50-75%	4
Less than 50%	10
None	18
Not applicable	2

Q5.1: Whether there were links on the home and/or introductory page to a page containing further relevant information

BASE: All stores

	%
Yes	79
No	21

Q5.2: Where the links were located

BASE: All stores with websites home/introductory pages linking to further content

	No. websites
Home page	6
Introductory pages – some	3
Introductory pages – all	7
Question not answered	4

Q9.1: Whether taken to a promotional page before taken to homepage

BASE: All websites

	No. websites
Yes	1
No	12
Question not answered	1

Q9.2: Proportion of products clearly showing duration of extended warranty

BASE: All websites with a promotional page

	No. websites
None	1

Q9.3: Proportion of products clearly showing price of extended warranty

BASE: All websites with a promotional page

	No. websites
None	1

Q9.4: Proportion of products showing that extended warranty applied to a range

BASE: All websites with a promotional page

	No. websites
None	1

Q9.5: Proportion of products clearly showing extended warranty is optional

BASE: All websites with a promotional page

	No. websites
None	1

Q10.1: Whether homepage showed any products with prices

BASE: All websites

	No. websites
Yes	12
No	2

Q10.2: Proportion of products clearly showing duration of extended warranty

BASE: All websites with products on homepage

	No. websites
All	2
Over 75%	1
Less than 50%	1
None	8

Q10.3: Proportion of products clearly showing price of extended warranty

BASE: All websites with products on homepage

	No. websites
All	2
Over 75%	1
Less than 50%	1
None	8

Q10.4: Proportion of products showing that extended warranty applied to a range

BASE: All websites with products on homepage

	No. websites
All	2
Over 75%	1
Less than 50%	1
None	8

Q10.5: Proportion of products clearly showing extended warranty is optional

BASE: All websites with products on homepage

	No. websites
All	2
Over 75%	1
Less than 50%	1
None	8

Q11.1: Whether taken to an introductory page showing prices

BASE: All websites

	No. websites
Yes	13
No	1

Q11.2: Proportion of products clearly showing duration of extended warranty

BASE: All websites with introductory page

	No. websites
All	8
Less than 50%	1
None	4

Q11.3: Proportion of products clearly showing price of extended warranty

BASE: All websites with introductory page

	No. websites
All	8
Less than 50%	1
None	4

Q11.4: Proportion of products showing that extended warranty applied to a range

BASE: All websites with introductory page

	No. websites
All	8
Less than 50%	1
None	4

Q11.5: Proportion of products clearly showing extended warranty is optional

BASE: All websites with introductory page

	No. websites
All	8
Less than 50%	1
None	4

Q12: Whether extended warranties appear to be available only on some goods

BASE: All websites

	No. websites
Yes	12
No	1
Not applicable	1

Q13.1: Whether price and duration of extended warranty shown next to product price at checkout

BASE: All websites offering an extended warranty

	No. websites
Yes	12

Q13.2: Whether extended warranty mentioned at the checkout stage

BASE: All websites where extended warranty not mentioned before checkout

	No. websites
Yes	1
No	1

Q13.3: Whether price and duration of extended warranties clearly shown at checkout

BASE: All websites where extended warranties were mentioned only at the checkout stage

	No. websites
Yes	1

D EXOGENOUS FACTORS OTHER THAN THE ORDER IMPACTING ON PRICE

D.1 In this Annex we set out some factors, independent from the Order, that might impact on the price of extended warranties. We describe both demand-side and supply-side factors that might have influenced the prices either up or down. As noted in the main text, due to resource limitations we have not attempted to quantify the degree to which these factors have impacted on price.

D.2 Factors that might impact on extended warranty prices include:

- DEG prices
- Level of consumer disposable income
- Comparative independent service repair costs
- Costs of meeting claims
- Reliability of the DEG

DEG prices

D.3 As explained in section 3, DEG prices have fallen. This fall could impact on extended warranty prices because prices of extended warranties are linked to the prices of the underlying DEGs. A decrease in the price of a DEG might mean it fell into a lower price band and therefore attract a lower extended warranty price. Therefore, customers might benefit from a lower extended warranty price for a specific DEG even if the retailer has not changed its price structure. From the customer's perspective, the price of the extended warranty would have decreased.

D.4 In the analysis below we attempt to control for this effect by looking at the change in the price of an extended warranty for a DEG of a given value.

Disposable income

- D.5 As explained in Section 3, consumers' disposable income has increased. Since DEG prices have decreased, the price of any given DEG will now be a smaller proportion of disposable income. Consumers are more likely to be able to afford to replace a DEG if it breaks down, and may be more willing to bear the risk of having to pay for a replacement. This would reduce the demand for extended warranties which would put downward pressure on extended warranty prices.

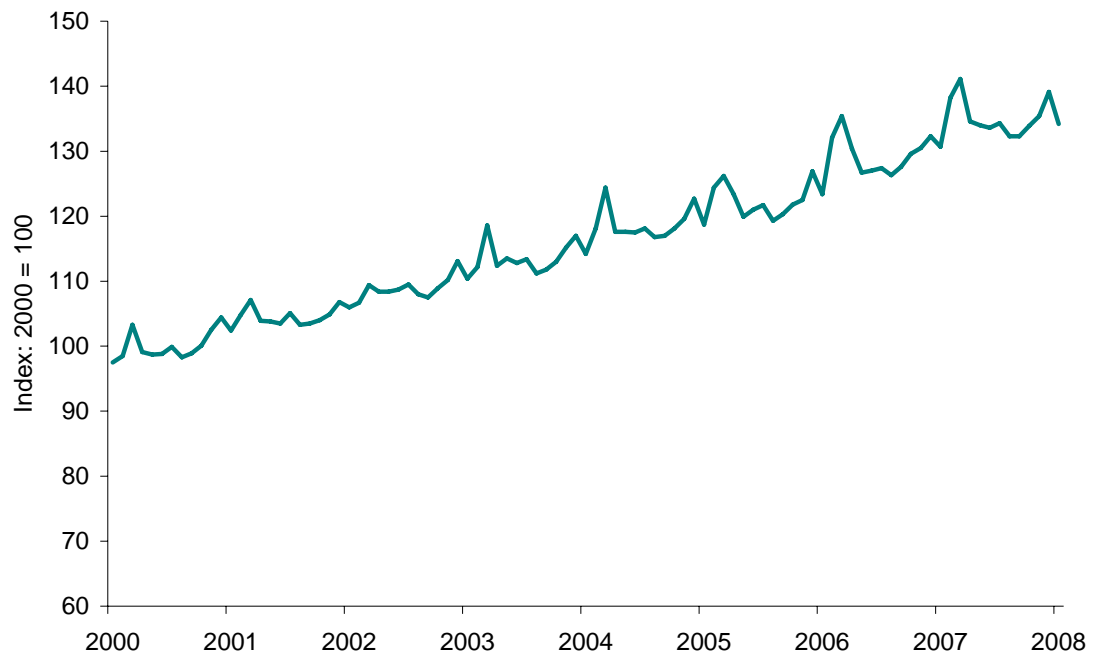
Independent service repair costs

- D.6 As mentioned in Section 3 a factor that might have an impact on the prices of extended warranties is the demand for independent repair services of DEGs. Independent repair services are an alternative to extended warranties for customers. We observed in Chart 3.4 that there has been an increase in the price of repair services. That increase in price is likely to have a positive impact on the demand for extended warranties, leading to an increase in prices. In addition, repair services are also an input used by providers of extended warranties to provide services to customers making a claim on their policy. An increase in the cost of repairs therefore increases the cost of providing extended warranties, which would also put upward pressure on extended warranty prices.

Underlying costs of providing extended warranties

- D.7 A stakeholder told us that there are two main underlying cost drivers to providing extended warranties: the cost of engineers to fix the DEG, and the cost of transporting the engineers to the customer.
- D.8 To illustrate how these costs have moved we set out below indices for engineers' wages (as a measure of the cost of an engineer services) and consumer price index for liquid fuels (as a partial measure of the cost of transport).

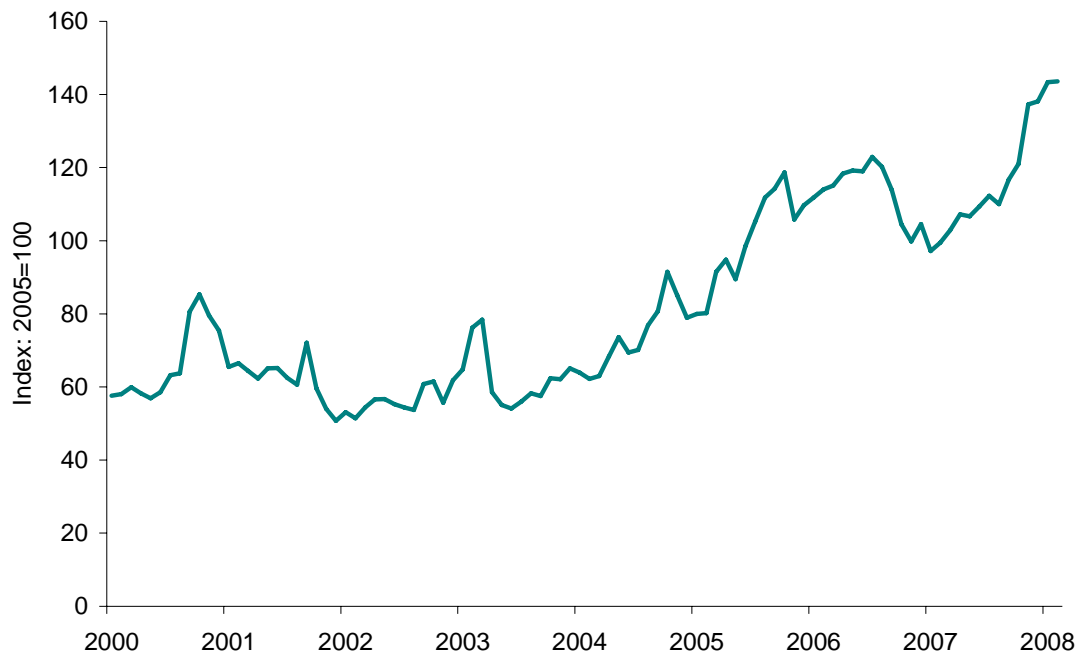
Chart D.1: Average earnings index: Engineering & Allied Industries



Notes: (i) Not seasonally adjusted, includes bonuses.

Source: National Statistics, series JVUL.

Chart D.2: CPI index: Liquid fuels



Source: National Statistics, series D7DV.

D.9 Both indices show a strong upward trend, suggesting that these cost components of an extended warranty have increased. This suggests that the cost of meeting an extended warranty claim has risen.¹ Given these cost increases, all other things being equal, one might expect that suppliers of extended warranties would increase the price of an extended warranty. However, suppliers' costs may also be affected by changes in product reliability, which we discuss below.

Reliability of DEG

D.10 The reliability of the DEG will affect the expected cost of providing an extended warranty. A DEG that is more prone to breaking down or will cost more to fix if it broke down, will have a higher expected cost to the supplier and therefore attract a higher extended warranty price. For

¹ This evidence is consistent with the Chart 3.4 that shows the cost of repairs has risen.

example, washing machines have a high attrition rate therefore attract a high extended warranty price in relation to the DEG price.²

- D.11 A retailer told us that over the past ten years the reliability of DEGs has improved, although we have not received any evidence on this. If the reliability of a DEG has improved, the expected cost to meet the claims under an extended warranty would have fallen. This would put downward pressure on the price of an extended warranty.

Technology cycles

- D.12 Technology cycles may also influence the price of the extended warranty. An example is televisions, which have experienced a major technology cycle moving from cathode-ray tubes to liquid-crystal displays ('LCDs') and plasma flat screens. Initially the extended warranty price of plasma TVs was very high due to uncertainties about the cost of meeting a claim. However as plasma screens have moved into mass production, the cost of components has decreased and suppliers of extended warranties have a better understanding of how likely they will be to break down and how much they will cost to repair. The extended warranty price for a given plasma TV has subsequently fallen.
- D.13 New technology may also increase demand for extended warranties as consumers want to protect themselves against the unknown.

² Although reliability differs between brands, extended warranty suppliers do not normally differentiate prices between brands because it would make the pricing structure too complex.

E PRICE ANALYSIS

E.1 In this section we set out our analysis of price data. There are two analyses. The first is a comparison of prices in 2003 with prices in 2008. The second is analysis of annual prices of two retailers who provided us with data.

Price changes 2003 to 2008

E.2 In the tables below we set out comparisons of five-year extended warranty prices in 2003 and 2008 for selected retailers.^{3,4,5} For this comparison we have used five-year extended warranties for televisions, washing machines, and fridge/freezers.⁶ We have set out the data by price point, rather than the price bands that retailers normally use to set extended warranty prices. This is because price bands differ between

³ The data we have used in this analysis does not cover all retailers, all price points or all DEGs, therefore we do not claim that this analysis fully reflects the extended warranty market. This analysis is for illustrative purposes only.

⁴ For the 2003 prices we have used figures from the Competition Commission report, Appendix 11.2. For the 2008 figures we have mainly used current price lists taken from stores and websites. For Bennetts and Millers we gathered prices by selecting DEGs on their websites, and then looking for the prices of the extended warranties offered with the DEG. In some instances these suppliers did not have DEGs at all price points, so there may be some minor discrepancies between the prices listed and the actual extended warranty price.

⁵ We note that the prices cannot be directly compared between retailers because the coverage of each retailer's extended warranty is different. These prices also do not take account of changes in coverage, or other terms and conditions, between 2003 and 2008.

⁶ The DEGs and retailers chosen for the analysis were selected based on a) their relative importance in the market (that is, large retailers were chosen over small retailers and DEGs with high extended warranty penetration rates were chosen over DEGs with low rates) and b) availability of data (not all retailers were surveyed by the Competition Commission in 2003, they have gone out of business or they have changed their extended warranty price structure so a comparison was not possible).

retailers and, for some retailers, have changed over time. Using price points allows us to make comparisons between retailers and over time.⁷

E.3 As a guide to the relative importance of the prices we have listed, the table below provides approximate market shares for each of the retailers we have collected data for. These market shares are based on data from the consumer survey, which asked respondents the retailer from which they bought their DEGs.

Table E.1: Approximate market shares

Retailer	DEG market share
Curry's	16
Argos	11
Comet	10
John Lewis	3
MFI	< 1
Miller Bros	< 1
Bennett's	NA

Notes: (i) Based on number of DEGs purchased. (ii) For indicative purposes only. (iii) Curry's is part of the DSG Group, which also includes Dixons, PC World, and The Link. We include only Curry's above because the prices we have analysed were for Curry's only.

Source: Marketing Sciences consumer survey Q4.

Televisions

E.4 In table E.2 we show extended warranty prices for televisions. The table shows how much it would cost a consumer to purchase an extended warranty for a DEG of the stated price in 2003 compared to 2008. We have shaded those 2008 prices that are lower than 2003.

⁷ We have compared nominal prices rather than real prices. First, given the scope and the resource for this project, we have not collected information on real price changes. Also we believe it was most appropriate to use nominal prices because extended warranty prices are set relative to the price of the DEG.

Table E.2: Extended warranty prices for televisions 2003-2008⁸

DEG Price	Curry's		Comet		Miller Bros		Bennett's	
	2003	2007	2003	2008	2003	2008	2003	2008
100	55	45	49.99	44.99	64		54.99	44.99
200	79	59	74.99	59.99	89	199	69.99	59.99
300	99	89	129.99	89.99	109	199	99.99	89.99
400	139	119	169.99	119.99	149	199	149.99	119.99
500	179	149	169.99	149.99	199	229	149.99	149.99
600	195	219	189.99	189.99	199	229	179.99	189.99
700	195	219	189.99	219.99	199	229	179.99	219.99
800	259	249	254.99	219.99	239	259	199.99	219.99
900	259	249	254.99	249.99	239	259	199.99	249.99
1000	259	249	254.99	249.99	239	259	199.99	249.99
1100	309	299	304.99	299.99	309	299	289.99	nk
1200	309	299	304.99	299.99	309	299	289.99	nk

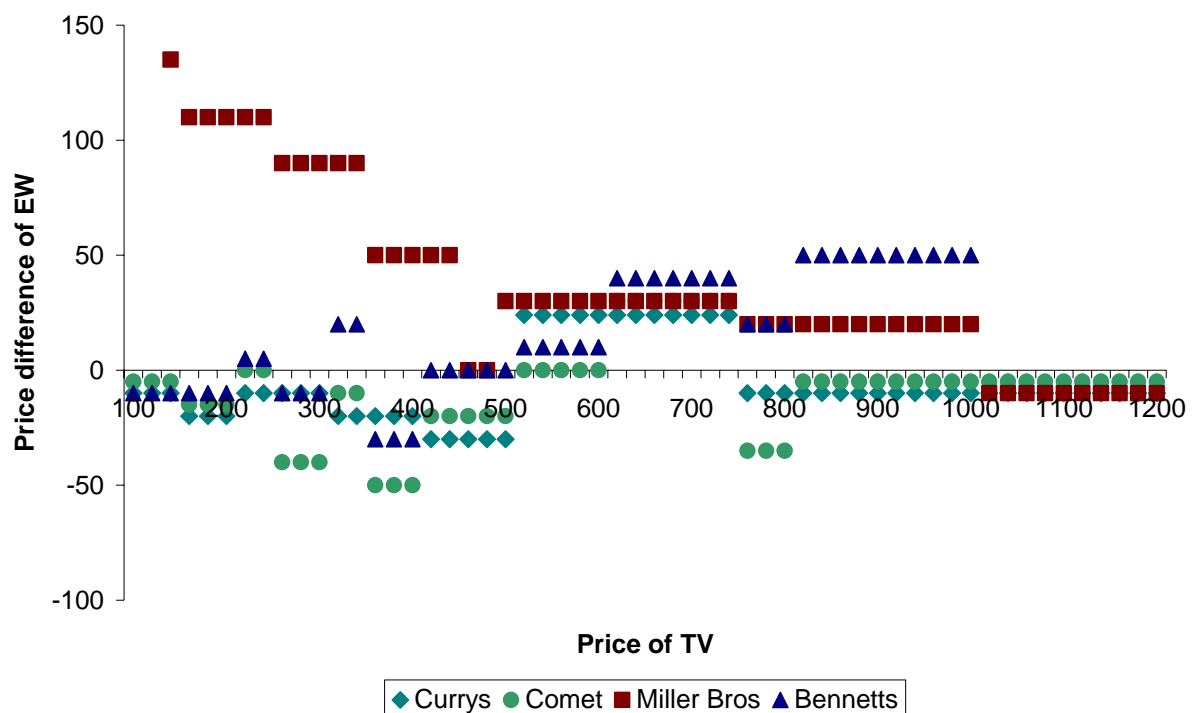
Notes: (i) Prices for five year extended warranties. (ii) 'nk' = not known. (iii) Shaded boxes show decreases in price between 2003 and 2008. (iv) Does not take account of changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: price lists for Curry's and Comet; author's own research for Miller Bros and Bennett's.

E.5 Chart E.3 below shows the net change in prices of extended warranties for televisions using the data in Table E.2 above. The horizontal axis plots the price of the DEG, while the vertical axis plots the change in price of the extended warranty between 2003 and 2008. An observation that falls below the horizontal line indicates that the extended warranty price in 2008 is lower than in 2003.

⁸ Curry's price data is available up to 2007.

Chart E.3: Net change in nominal prices of extended warranties for televisions (2003-2008)



Notes: (i) Changes in price do not control for changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: price lists for Curry's and Comet; authors' own research for Miller Bros and Bennett's.

E.6 The chart shows that some prices have increased and some have decreased between 2003 and 2008. In particular the extended warranty prices offered by the large DEG retailers, Curry's and Comet, appear to have decreased for most price points of televisions. The prices for small DEG retailers show a mixed pattern. Miller Bros' prices have mostly increased except for the highest-priced televisions. Bennett's prices have decreased for lower-priced televisions but increased for higher-priced televisions. We note that televisions are an example of a DEG whose technology has changed rapidly since the Competition Commission's report. There has been a shift from standard cathode-ray-tube televisions to LCD and Plasma screens. The changes in extended warranty price may be due the impact of that technology switch. The price changes we present in the graph do not control for such changes.

Washing machines

E.7 In the following two tables we set out extended warranty prices for washing machines.

Table E.4: Extended warranty prices for washing machines 2003-2008

DEG Price	Curry's		Comet		Argos		MFI	
	2003	2007	2003	2008	2003	2008	2003	2008
160	119	99	114.99	99.99	nk	104.99	180	190
200	119	99	144.99	99.99	nk	109.99	180	190
240	145	129	144.99	129.99	149.99	139.99	180	190
280	145	149	144.99	159.99	149.99	139.99	180	190
320	169	179	164.99	159.99	149.99	139.99	180	190
360	169	199	164.99	159.99	174.99	149.99	180	190
400	169	199	184.99	189.99	174.99	149.99	180	190
440	185	229	184.99	189.99	174.99	149.99	180	190
480	185	229	184.99	239.99	174.99	149.99	180	190
520	195	269	194.99	239.99	174.99	149.99	180	190
560	195	269	194.99	239.99	174.99	149.99	180	190
600	195	269	194.99	239.99	174.99	149.99	180	190

Notes: (i) Prices for five year extended warranties. (ii) 'nk' = not known. (iii) Argos 2008 prices show extended warranty for labour + manufacturer's parts guarantee. (iv) Shaded boxes show decreases in price between 2003 and 2008. (v) Does not take account of changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: price lists for Curry's, and Comet, websites for Argos and MFI.

Table E.5: Extended warranty prices for washing machines 2003-2008

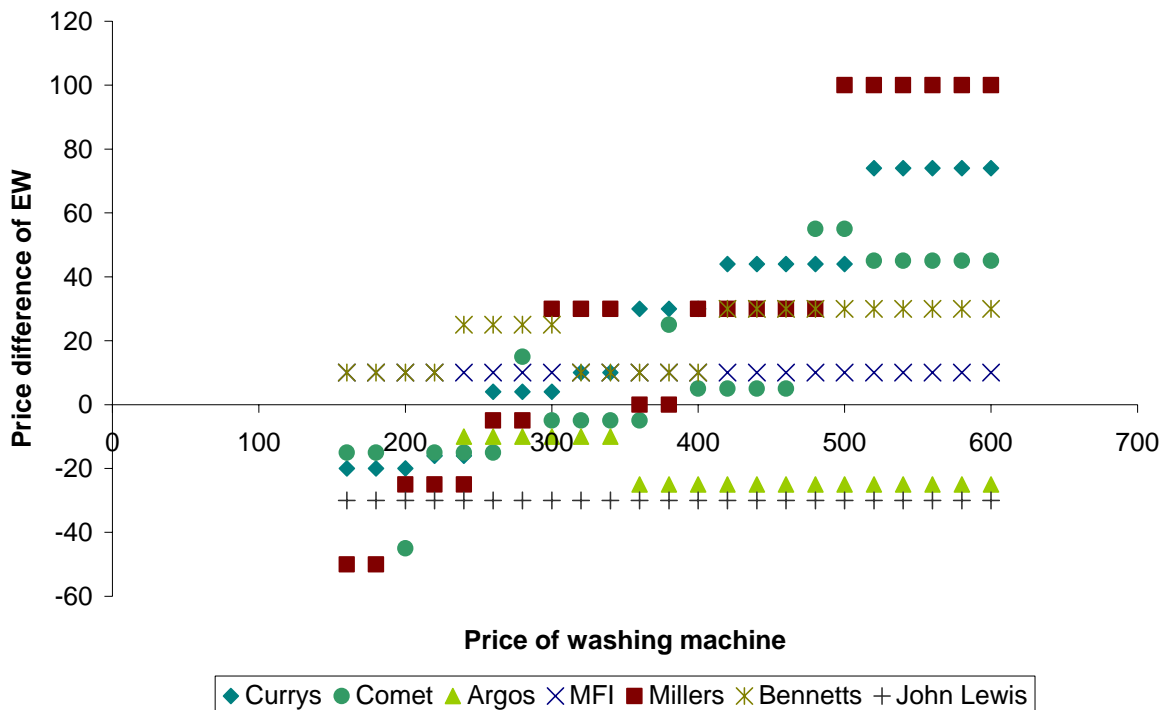
DEG Price	Miller Bros		Bennett's		John Lewis	
	2003	2008	2003	2008	2003	2008
160	169	119	130	139.99	105	75
200	169	144	130	139.99	105	75
240	169	144	150	174.99	105	75
280	169	164	150	174.99	105	75
320	169	199	180	189.99	105	75
360	199	199	180	189.99	105	75
400	199	229	180	189.99	105	75
440	199	229	200	229.99	105	75
480	199	229	200	229.99	105	75
520	199	299	200	229.99	105	75
560	199	299	200	229.99	105	75
600	199	299	200	229.99	105	75

Notes: (i) Prices for five year extended warranties. (ii) Bennett's has an extended warranty for £199 for a Siemens washing machine that costs over £600. (iii) Shaded boxes show decreases in price between 2003 and 2008. (iv) Does not take account of changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: websites for Miller Bros, Bennett's, and John Lewis.

E.8 The chart below sets out the net price changes of extended warranties for washing machines. The horizontal axis plots the price of the DEG, while the vertical axis plots the change in price of the extended warranty between 2003 and 2008. An observation that falls below the horizontal line indicates that the extended warranty price in 2008 is lower than in 2003.

Chart E.6: Net change in nominal prices of extended warranties for washing machines (2003-2008)



Notes: (i) Changes in price do not control for changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: price lists for Curry's and Comet, websites for Argos, MFI, Miller Bros, Bennett's, and John Lewis.

E.9 The results for the net price changes of washing machines are mixed. Curry's, Comet and Miller Bros appear to have reduced their extended warranty prices for lower-priced washing machines and increased them

for the higher-priced washing machines. Argos and John Lewis appear to have reduced prices of their extended warranties for all washing machines. MFI has a standard price for all extended warranties for washing machines, and increased it slightly over the period. Bennett's appears to have increased its extended warranty prices for all washing machine price levels.

Fridge freezers

- E.10 In the tables and chart below we set out extended warranty prices for fridge/freezers.

Table E.7: Extended warranty prices for fridge/freezers 2003-2008

DEG Price	Curry's		Comet		Argos		MFI	
	2003	2008	2003	2008	2003	2008	2003	2008
100	49	45	64.99	69.99	64.99	62.99	120	130
160	69	59	64.99	69.99	64.99	62.99	120	130
220	85	79	114.99	89.99	64.99	62.99	120	130
280	85	99	114.99	89.99	79.99	67.99	120	130
340	119	129	114.99	129.99	79.99	67.99	120	130
400	119	129	114.99	129.99	89.99	79.99	120	130
460	185	179	199.99	169.99	89.99	79.99	120	130
520	185	179	199.99	169.99	89.99	79.99	120	130
580	185	179	199.99	169.99	89.99	79.99	120	130
640	245	229	199.99	169.99	89.99	79.99	120	130
700	245	229	199.99	169.99	89.99	79.99	120	130
760	245	229	199.99	199.99	89.99	79.99	120	130

Notes: (i) Prices for five year extended warranties. (ii) Argos 2008 prices show extended warranty for labour + manufacturer's parts guarantee. (iii) Shaded boxes show decreases in price between 2003 and 2008. (iv) Does not take account of changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: price lists for Curry's, and Comet, websites for Argos and MFI.

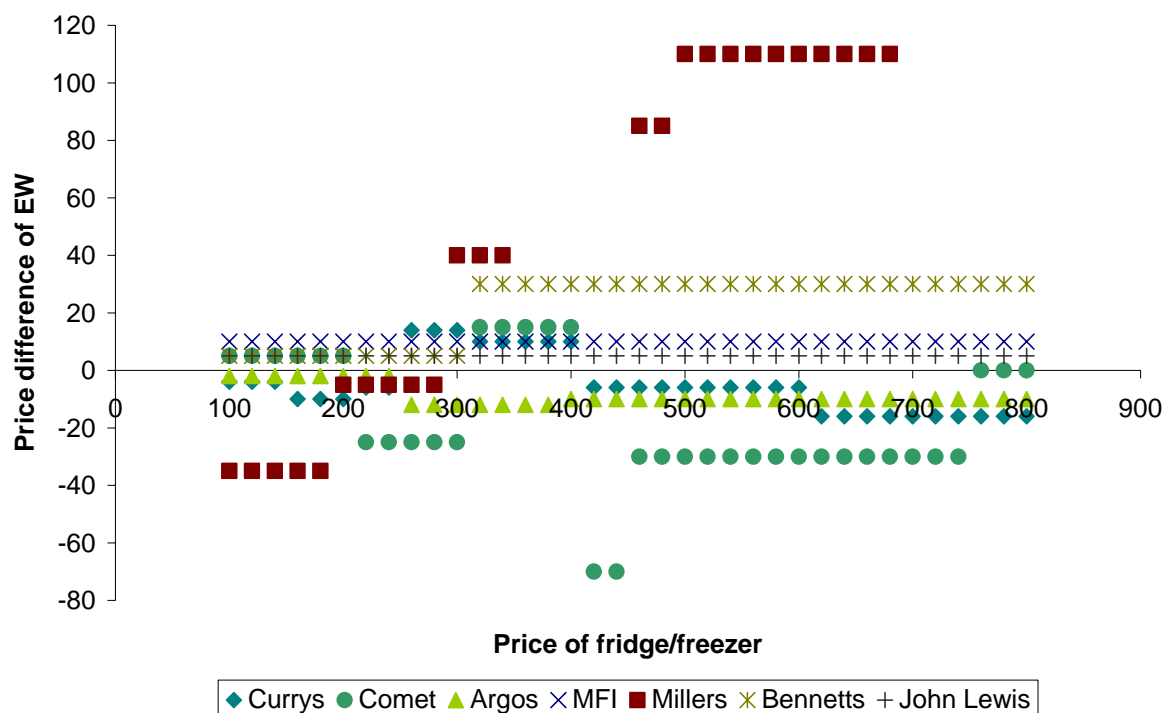
Table E.8: Extended warranty prices for fridge/freezers 2003-2008

DEG Price	Miller Bros		Bennett's		John Lewis	
	2003	2008	2003	2008	2003	2008
100	104	69	69.99	74.99	65	70
160	104	69	69.99	74.99	65	70
220	104	99	69.99	74.99	65	70
280	104	99	69.99	74.99	65	70
340	104	144	99.99	129.99	65	70
400	104	nk	99.99	129.99	65	70
460	104	189	99.99	129.99	65	70
520	104	214	99.99	129.99	65	70
580	104	214	99.99	129.99	65	70
640	104	214	99.99	129.99	65	70
700	104	nk	99.99	129.99	65	70
760	104	nk	99.99	129.99	65	70

Notes: (i) Prices for five year extended warranties. (ii) Shaded boxes show decreases in price between 2003 and 2008. (iii) Does not take account of changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: websites for Miller Bros, Bennett's and John Lewis.

Chart E.9: Net change in nominal prices of extended warranties for fridge freezers (2003-2008)



Notes: (i) Changes in price do not control for changes in policies.

Source: 2003 prices: Competition Commission report, Appendix 11.2. 2008 prices: price lists for Curry's, and Comet, websites for Argos, MFI, Miller Bros, Bennett's and John Lewis.

E.11 The leading retailers (Curry's, Comet and Argos) appear to have decreased their extended warranty prices for fridge/freezers at virtually all DEG price levels. MFI has a standard price for all extended warranties for washing machines, and it increased it slightly over the period. Miller Bros appears to have decreased its extended warranty prices for lower priced fridge/freezers and increased them for the higher priced fridge/freezers. Both Bennett's and John Lewis appear to have increased their extended warranty prices for fridge/freezers at all levels.

Year-on-year comparison of prices

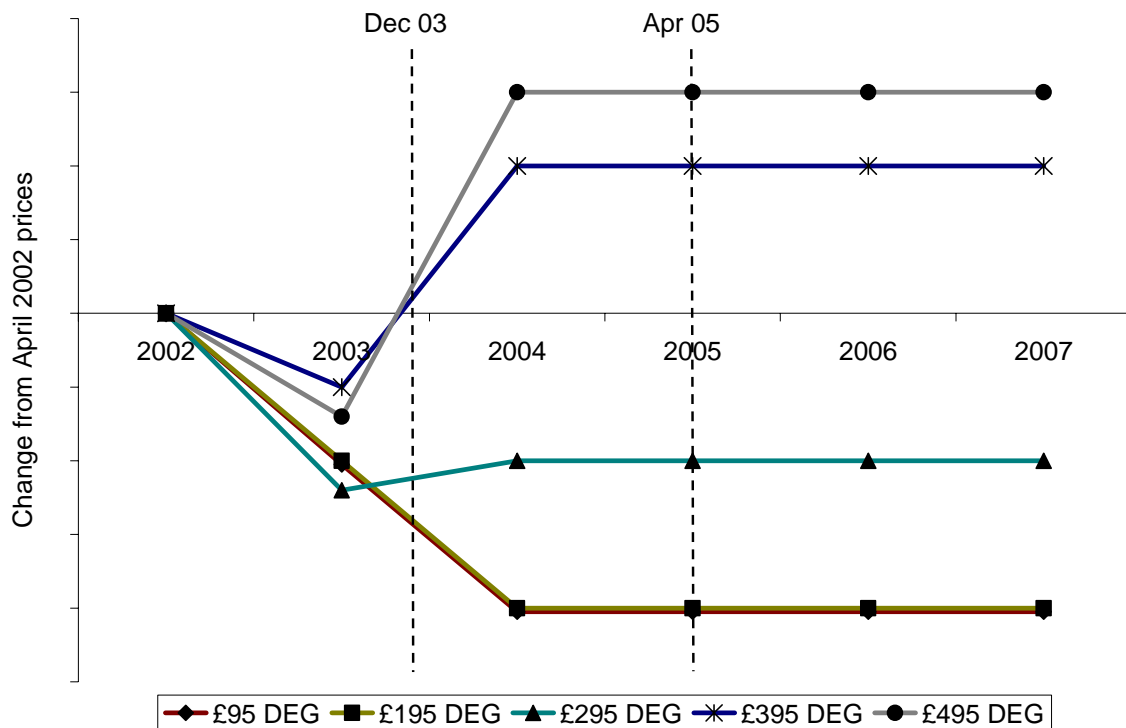
Retailer A

- E.12 Retailer A provided price data for its extended warranty products for the period 2002 to 2007. As mentioned, we have used these data to track the movement of prices of televisions, washing machines and fridge freezers.⁹ We have selected price points to cover a range of DEG prices that the retailer offers extended warranties on.¹⁰ We have charted the prices relative to 2002 to focus on changes in prices of extended warranties since the start of the Investigations. Therefore an observation below the horizontal axis indicates a price lower than in 2002.
- E.13 The chart below shows the period-on-period changes in the prices of extended warranties for washing machines provided by Retailer A.

⁹ We have removed some data from the graphs to satisfy confidentiality concerns.

¹⁰ As in the previous subsection, we have used DEG price points rather than price bands to analyse changes in extended warranty prices, to overcome the problem that the retailer's price bands have changed over time.

Chart E.10: Change in the extended warranty price for washing machines



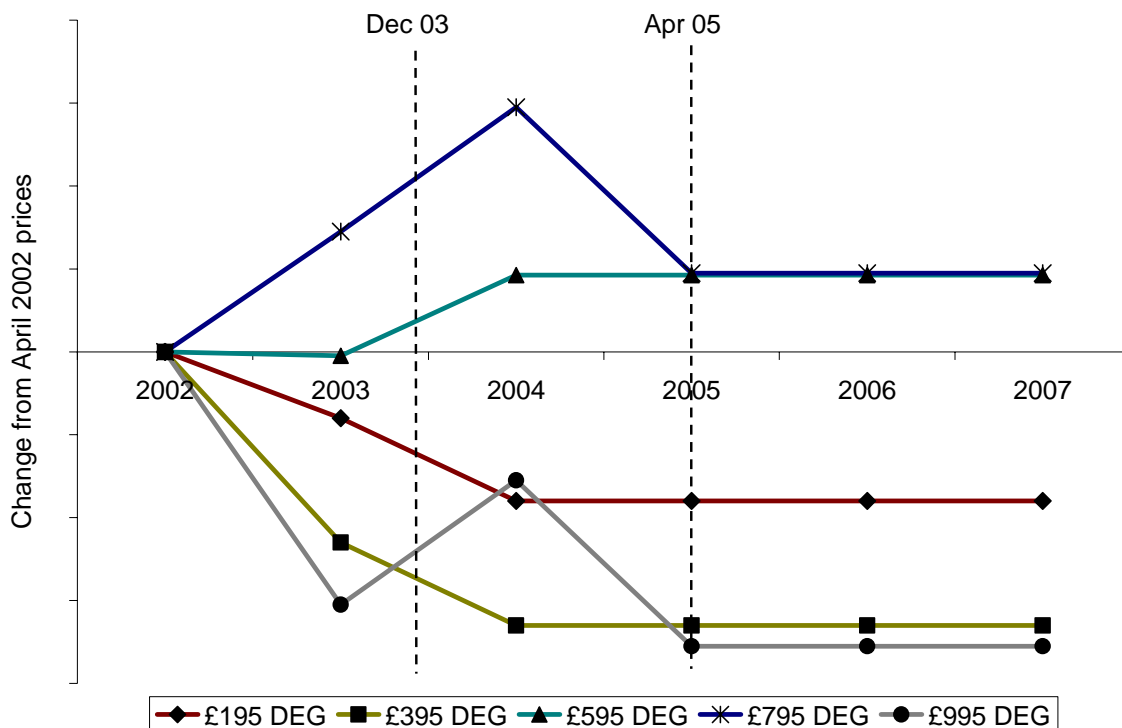
Notes: (i) Price change for 5 year extended warranties (ii) Prices illustrated are for April of the year shown.

Source: Data provided by Retailer A.

E.14 The chart for washing machines shows that initially all prices fell. However, in 2004 some prices increased. Over the full period, the extended warranty price for a washing machine costing £95, £195 or £295 fell, while the extended warranty price for a washing machine costing £395 or £495 rose. There have been no changes in prices of extended warranties since the Order came into force at the DEG price points we surveyed.

E.15 The chart below shows the change in extended warranty prices for televisions.

Chart E.11: Change in the extended warranty price for TVs



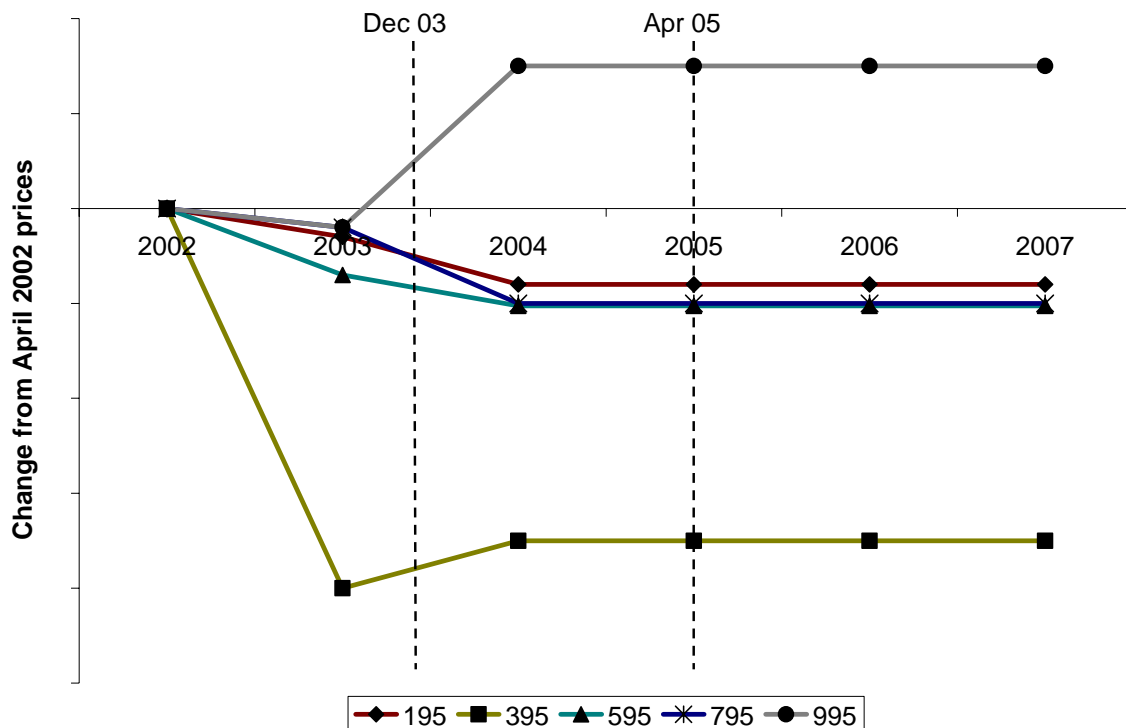
Notes: (i) Price change for 5-year extended warranties. (ii) Prices illustrated are for April of the year shown.

Source: Data provided by Retailer A.

E.16 From the chart we see that the extended warranty price changes are mixed. Initially the extended warranty price for a TV priced at £595 and £795 increased, while those for a TV priced at £195, £395 and £995 fell. There have been no changes in prices of extended warranties since the Order came into force at the DEG price points we surveyed.

E.17 The chart below shows the changes in prices of extended warranties for fridge/freezers provided by retailer A.

Chart E.12: Change in the extended warranty price for fridge freezers



Notes: (i) Price change for 5 year extended warranties (ii) Prices illustrated are for April of the year shown.

Source: Data provided by Retailer A.

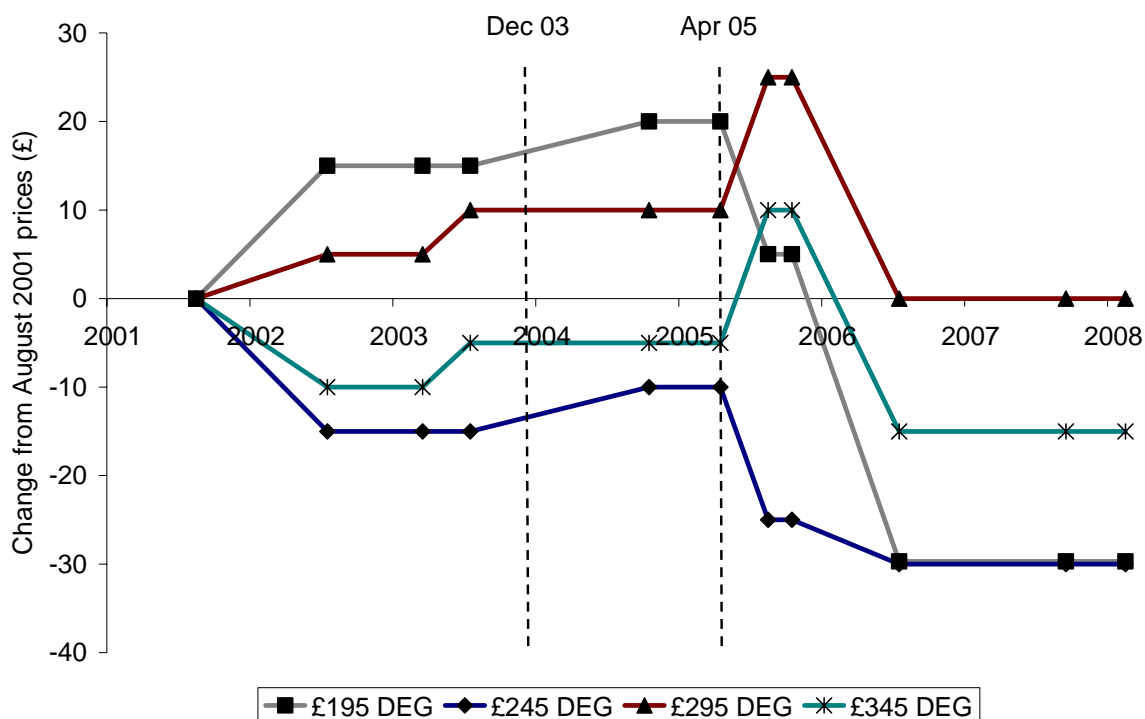
- E.18 The chart for fridge freezers shows that all extended warranty prices initially fell. In 2004 extended warranty prices for fridge freezers priced at £995 and £395 rose. Over the full period, extended warranty prices fell for all fridge freezer prices surveyed except for £995. There have been no changes in prices of extended warranties since the Order came into force at the DEG price points we surveyed.
- E.19 A feature of all these charts is that although there were price reductions for some extended warranties, they all preceded the Order. The price reductions instead occurred during the Competition Commission's investigation.

Retailer B

- E.20 Retailer B provided price data for 2001-2008 and information that identified where its extended warranties sales volume was most concentrated for certain DEGs (washing machines, fridge freezers, and televisions) in 2007. We have used this information to track changes in the prices of extended warranties. The extended warranty price points we have used for each DEG covered price bands which account for over 75 per cent of the retailer's extended warranty sales volume.¹¹
- E.21 The chart below shows the extended warranty prices for washing machines. The graph identifies the extended warranty price changes for four price points. These price points fall in the price band (£170-£360) that accounted for 75 per cent of the retailer's extended warranty sales by volume for washing machines in 2007.

¹¹ We note that the price bands for which the retailer has provided data is for DEGs at the lower end of the price range. Therefore although the data are for 75 per cent of sales by volume, the proportion of sales by value may be lower. Furthermore there may be differences in the extended warranty price trends for DEGs outside the range we have displayed.

Chart E.13: Change in extended warranty price of washing machines



Notes: (i) Prices for 5 year extended warranty. (ii) Prices shown fall into the bands that account for 75% of Retailer B's sales by volume.

Source: Data provided by Retailer B.

E.22 The chart shows that over the period the extended warranty prices for the price points we have surveyed have both risen and fallen. The extended warranty prices for £195 and £295 washing machines initially rose, but fell in later periods. The extended warranty prices for £245 and £345 washing machines initially fell, and generally continued to fall except for the occasional increase.

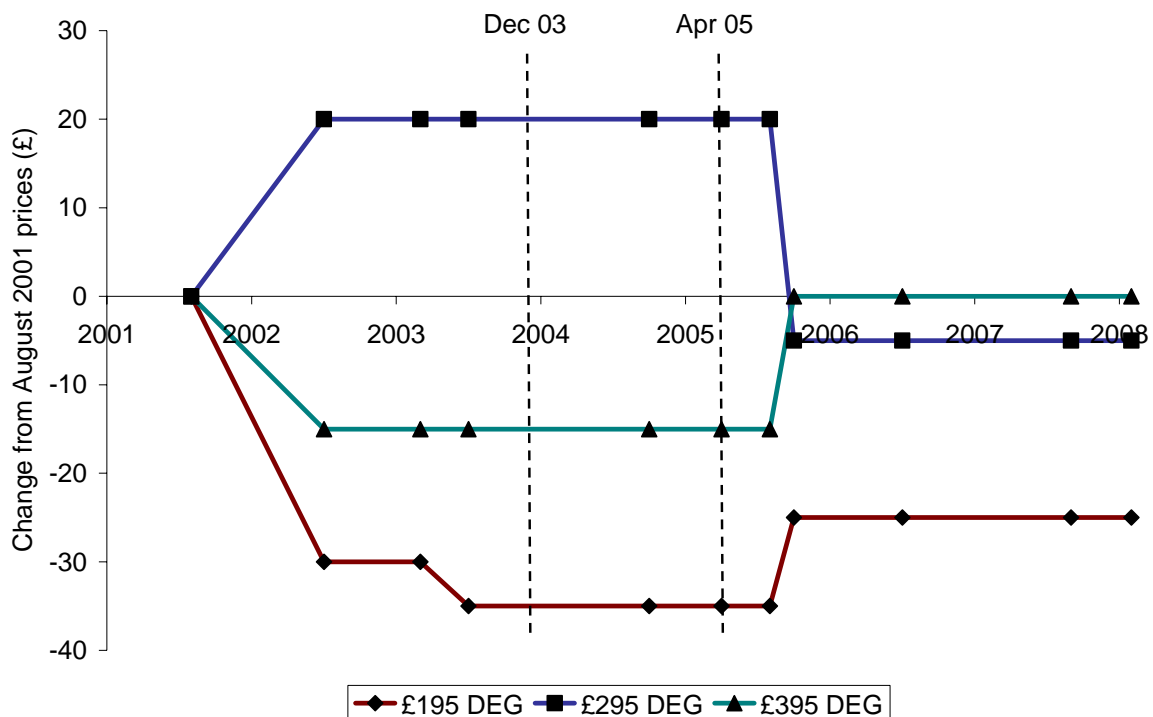
E.23 It is interesting to note that since the implementation of the Order, extended warranty prices fell for all the washing machines prices (albeit after an initial increase for £345 and £295 washing machines). This may indicate the impact of the Order. Overall, for all the price points shown extended warranty prices have fallen or are the same compared to August 2001. This means that a customer purchasing a washing machine from the retailer at any of these price points, could get an

extended warranty for the same or lower price today than in August 2001.

E.24 Retailer B provided evidence that extended warranty prices for LCD televisions had fallen. The retailer also provided data that showed extended warranty prices for plasma televisions had fallen dramatically. However, as the retailer noted, mass production of LCD and plasma televisions had begun during the period. The prices of the DEG and the component costs came down. Better understanding of the reliability of the technology and lower component costs resulted in corresponding reductions in the prices of the extended warranties which may partially account for the decrease.

E.25 In the chart below, we set out the price changes for fridge freezers at three price points. These price points fall in the price band (below £399) that accounted for 75 per cent of the retailer's extended warranty sales by volume for fridge freezers in 2007.

Chart E.14: Price change for fridge freezers



Notes: (i) Prices for 5 year extended warranty. (ii) Price bands shown account for 75% of Retailer B's sales by volume.

Source: Data provided by Retailer B

- E.26 The chart shows that initially there were significant changes to the extended warranty prices for the price points. Prices for the £195 and £395 fridge freezers initially decreased, while the price for a £295 fridge freezer increased. The prices then remained unchanged until after the implementation of the Order.
- E.27 The changes since the Order are mixed. The extended warranty prices for the £195 and £395 fridge freezer increased, while the price for the £295 fridge freezer fell. Therefore the impact of the Order on extended warranty prices for fridge freezers is unclear. Overall, for all the price points shown extended warranty prices have decreased or are the same compared to August 2001. This means that a customer purchasing a fridge freezer from the retailer at any of these price points, could get an extended warranty for the same or lower price today than in August 2001.

F EXTENDED WARRANTY SUPPLIERS' CANCELLATION PERIODS

Supplier	2002	2008
Argos	30	45
Comet	14	45
Dixons	14	45
Littlewoods	1 year	60
John Lewis	28	45
MFI	90	90
D&G	During manufacturer's guarantee	During manufacturer's guarantee
Retra	30	45
Sony	1 year	During manufacturer's guarantee
Warranty Direct	15	14

Notes: (i) Manufacturer's guarantee is a minimum of one year.

Source: Competition Commission report Table 2.8, own research.

G CONSUMER BENEFIT ESTIMATION

G.1 In this annex we set out how we estimated the net consumer benefit from the Order. We set out the Competition Commission's theory of harm and implied consumer detriment, the method we use to calculate the change in detriment, and then apply some sensitivity analysis to our results. The data that we have used to calculate the figures is at the end of this annex.

Theory of harm

G.2 The Competition Commission found that a complex monopoly existed in the supply of extended warranties which operated against the public interest. It found that consumers bought almost all extended warranties at the point-of-sale without access to relevant information on their value or consideration of alternatives.¹²

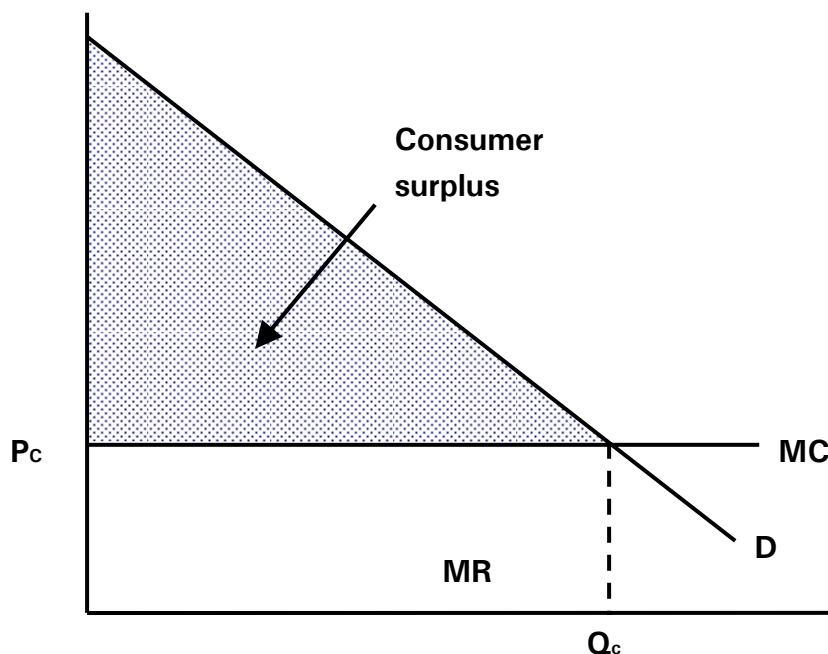
G.3 These conclusions imply that two market failures existed. The first market failure was a lack of effective competition in the supply of extended warranties. The second market failure arose because consumers lacked information regarding the value of the extended warranty, necessary to make informed decisions regarding its purchase. We explain the consumer detriment arising from these two market failures below.

G.4 First, consumer detriment arose because the extended warranty market was not fully competitive. If the market for extended warranties was fully competitive, consumers would receive the 'consumer surplus' shown in the chart below. The consumer surplus is the area under the

¹² See Competition Commission report, para. 1.15.

demand curve but above the marginal cost curve (the dotted area).¹³

Chart G.1: Consumer benefit from competitive market.



G.5 In the Chart above, the competitive price and quantity, P_c and Q_c are determined when demand, D , equals marginal costs (MC).

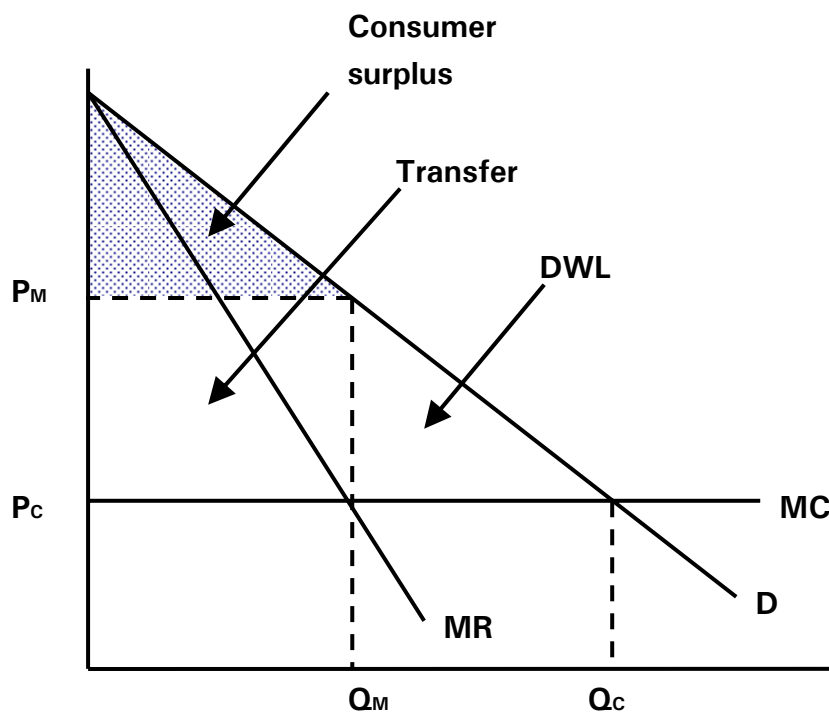
G.6 The Competition Commission's analysis of profitability found that retailers achieved a return on capital employed (ROCE) significantly

¹³ The demand curve shows the price that consumers are willing to pay for each unit purchased, in other words the value they expect to gain from that purchase. Where the demand curve is above the actual price paid (P_c in Chart G.1) the expected value of the purchase to the consumer is greater than the price they pay. This gap between the demand curve and P_c is the 'surplus' captured by the consumer – the difference between the value they expect to receive and the price they pay. The area between the demand curve and P_c will equal the sum of this surplus for all consumers. In a perfectly competitive market, price will equal marginal cost, so the consumer surplus is equal to the area between the demand curve and the marginal cost curve.

above their weighted average cost of capital (WACC).¹⁴ This means, in principle, that retailers could have priced extended warranties significantly lower and still made a profit. In contrast, insurers did not earn a ROCE above their WACC, suggesting that other sources of extended warranties may have been priced at competitive levels. If retailers were pricing above competitive levels, the detriment arising would have been similar to that arising from a monopoly controlling the supply of extended warranties offered at the point-of-sale. We illustrate this in the chart below.

¹⁴ See Competition Commission report, para. 2.215.

Chart G.2: Consumer detriment under monopoly pricing



- G.7 The complex monopoly leads to a price of P_M which is above the competitive level (P_C), and to a fall in output from Q_C , to its monopoly level, Q_M (determined by the equality between marginal revenues, MR, and MC).
- G.8 With monopoly pricing, the consumer surplus is the area under the demand curve but above P_M (the shaded area in the chart above). The difference in consumer surplus between the monopoly pricing and the competitive levels is the consumer detriment. This detriment, or reduction in consumer surplus, has two components: the transfer of surplus from consumers to the monopoly supplier and the deadweight loss.

- The transfer of wealth (the box denoted 'Transfer') comes about because consumers are purchasing units at a higher price that they would have paid in a competitive market.
- The deadweight loss (the triangle denoted 'DWL') comes about because at prices above competitive levels, some consumers do not buy extended warranties at all.

G.9 The Order was intended to empower consumers to shop around between extended warranty suppliers. This would be expected to lead to increased competition, reducing the consumer detriment shown in Chart G.2.

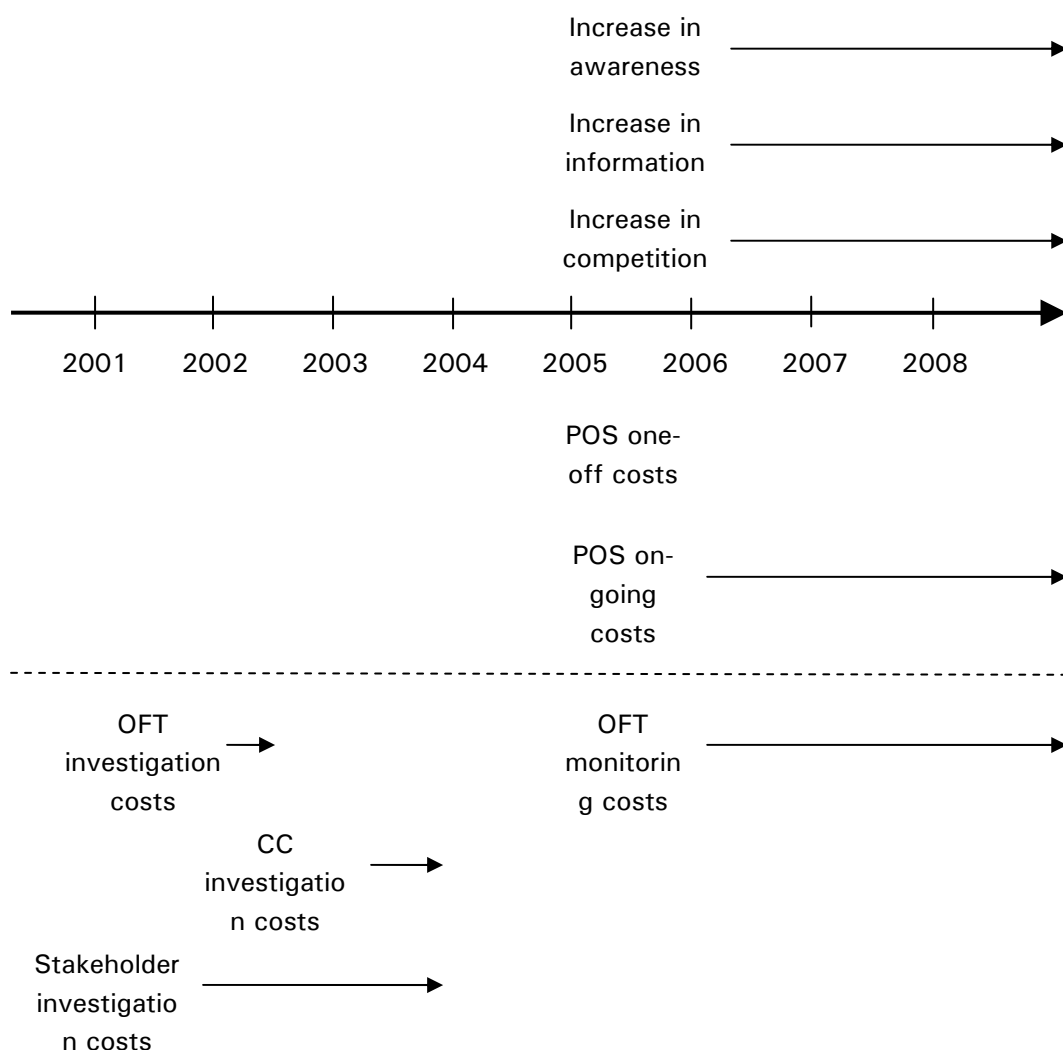
G.10 The second reason consumer detriment occurs is due to a lack of information concerning the value of the extended warranty itself. A market failure occurs because some consumers may not be able to adequately address the risks and costs and may therefore make a poor decision to purchase an extended warranty. The detriment that occurs as a consequence is the difference between the price that the consumer pays for the extended warranty and their valuation of it, were they to have access to, and the ability to process, the relevant information.

Methodology to calculate the change in consumer detriment

G.11 We now set out the methodology we have used to calculate the change in consumer detriment between 2002 and 2007.

G.12 The costs and benefits of the intervention in the extended warranties market are spread over time. The chart below illustrates the flow of costs and benefits associated with the investigations and the implementation of the Order.

Chart G.3: Benefit and cost timeline



Notes: (i) 'POS' refers to those point-of-sale suppliers to whom the Order applied. (ii) Calculating those costs below the dotted line is beyond the scope of this paper.

G.13 The OFT, Competition Commission and stakeholders all incurred costs during the investigations. The OFT incurred approximately £1 million, including search and selection costs and overheads, in its investigation costs in 2001 and 2002.¹⁵ The Competition Commission incurred £3.2

¹⁵ Since the implementation of the Order the OFT has incurred some monitoring costs.

million in its investigation costs mainly in 2002 and 2003. The stakeholders that were involved in the investigation incurred costs from the beginning of the OFT's investigation through to the end of the Competition Commission's investigation.

- G.14 The point-of-sale suppliers incurred one-off costs in the year of the Order's implementation, and on-going costs in the implementation year and subsequent years. These costs should be subtracted from the change in consumer benefit. It can be argued that these supplier costs are only relevant when calculating a change in social welfare and should not be included in a calculation of consumer benefits. However, we include them since these costs are likely to have been passed on to consumers through the prices of either extended warranties or DEGs.
- G.15 The benefit of the Order occurs from 2005 onwards following its implementation and the subsequent improvements in information and competition. During this period there would also have been an increase in consumer awareness due to the media publicity surrounding the introduction of the Order. There may also have been some impact on awareness prior to the Order, due to media coverage of the Investigations.

Costs of the implementation of the Order

- G.16 The Order has imposed costs on suppliers. These include 'one-off' costs incurred when the Order was implemented and 'on-going' costs incurred in order to maintain continued compliance with the Order. We have estimated the level of costs based on information provided to us by suppliers.

One-off costs

- G.17 We have estimated the one-off costs for the entire market based on the one-off costs of one retailer, as described in Section 7. The method was to take the retailer's estimate and divide by its market share to estimate

the total one-off costs to the market.¹⁶ This approach yields an estimated one-off cost of £4.9 million.¹⁷ We note this is roughly three times the estimated costs in the DTI's Regulatory Impact Assessment.¹⁸

On-going costs

- G.18 The Order is likely to have imposed some on-going costs on retailers. However the retailers did not provide us with any data from which we could estimate on-going costs. For the purposes of this calculation we have assumed ongoing costs are zero.
- G.19 This assumption does not mean to imply that the actual on-going costs of complying with the Order are zero. We have assumed this figure because the evidence from the interviews suggests on-going costs are unlikely to be significant and we lack reliable data with which to estimate on-going costs. In our sensitivity analysis later in this section we show that our results are not significantly affected by any plausible assumption on the level of ongoing costs.

The change in consumer detriment since 2002

- G.20 We now estimate the consumer benefit of the Investigations and the Order. We define this benefit as the change in consumer detriment between 2002 and 2007.¹⁹

¹⁶ We have not been able to verify the accuracy of this retailer's estimate of its compliance costs. However, we have no reason to believe that this retailer would wish to under-estimate its compliance costs. If there is any inaccuracy or bias in its estimate, we expect that it is more likely to have over-estimated than under-estimated its costs.

¹⁷ This estimate is based on the assumption that the costs incurred across the market are similar to the costs incurred by one retailer. In reality, IT system costs, amongst others, will differ between retailers.

¹⁸ See DTI RIA, para. 23. The DTI estimated that implementation costs would be no more than £1.5 million for the whole extended warranty sector.

G.21 We calculate the total change in consumer detriment by subtracting the level of consumer detriment in 2007 from the level in 2002. Specifically, we calculate the change in the transfer from consumers to suppliers of extended warranties and the change in the dead weight loss. Then we allocate the total change to factors associated with the Investigations and the Order.

G.22 In the Table below we list the assumptions and data used in our estimate of the total change in consumer detriment.

Table G.4: Assumptions used to calculate the total change in consumer detriment

Point-of-sale suppliers of extended warranties price at monopoly levels.

Non-point-of-sale suppliers of extended warranties price at competitive levels, which are a third lower than monopoly levels.

Customers do not incur any additional costs by purchasing from non-point-of-sale suppliers.

Constant marginal costs of supplying extended warranties.

Total market size was £892 million in 2002.

Point-of-sale suppliers captured 82 per cent of the market in 2002.

Point-of-sale suppliers' share of extended warranty sales in 2007 has fallen to 68 per cent.

The positions of the residual demand and supply curves have not changed since 2002.

Quality of extended warranties have not changed.

¹⁹ We use 2007 since data from our consumer survey conducted in January 2008 mainly relate to purchases by consumers over the previous year (2007).

G.23 We first calculate the consumer detriment in 2002 and then the detriment in 2007.

Consumer detriment in 2002

G.24 Our first step is to estimate the consumer detriment at the time of the Competition Commission's report.²⁰ We start with an assumption that, as the Competition Commission concluded, the point-of-sale suppliers were part of a complex monopoly. Therefore their prices were above competitive levels (at P_M in Chart G.2 above).

G.25 The Competition Commission found that the major retailers' ROCE was 'persistently and substantially' above their WACC.²¹ In particular, it found that the leading five suppliers of extended warranties (Dixons Group, Comet, Powerhouse, Littlewoods and Argos) could have priced extended warranties up to one-third lower.²² We have therefore assumed that P_c was one-third lower than P_M , and that all point-of-sale suppliers priced at P_M .²³ That is:

$$\left(\frac{P_m - P_c}{P_m}\right) = \frac{1}{3}$$

G.26 In comparison, the Competition Commission found that insurers (which were not part of retailer groups) were not in general earning a ROCE in

²⁰ Although in principle we would like to have a starting point prior to the investigations taking place, (that is, before 2001). We use 2002 because we rely on data from the Competition Commission consumer survey, whose results apply mainly to 2002. The Competition Commission's estimates on profitability covers 1998 to 2002.

²¹ See Competition Commission report, para. 2.215.

²² See Competition Commission report, para. 2.216.

²³ This is merely our starting point and we test in our sensitivity analysis section what happens if we vary this and other assumptions.

excess of their WACC.²⁴ Therefore we have assumed that non-point-of-sale suppliers price at P_c .

G.27 We have assumed that if non-point-of-sale suppliers are pricing at a level where ROCE equals WACC, their extended warranty prices are one-third below point-of-sale suppliers. That is, we assume that P_c is the same for both non-point-of-sale suppliers and point-of-sale suppliers. But this is not necessarily the case. If non-point-of-sale suppliers had a higher WACC, or their other costs were higher, then their P_c would be higher than the P_c for point-of-sale suppliers. The gap between the two sets of suppliers' prices would be less than one-third.

G.28 As a rough check of this assumption we have compared some 2002 prices of extended warranties that Comet and Curry's (the main point-of-sale suppliers) offered on televisions and washing machines to those of D&G's quote line (a major non-point-of-sale supplier).²⁵

²⁴ See Competition Commission report, para. 2.214.

²⁵ We have chosen Comet and Currys for our comparison because they were the leading point-of-sale suppliers of extended warranties. Together they accounted for 36 per cent of the market in 2002. We chose televisions and washing machines because they had the highest extended warranty penetration rate of the DEGs for which the Competition Commission report listed prices.

Chart G.5: Comparison of extended warranty prices in 2002

		Televisions			Washing machines		
		Curry's	Comet	D&G (Quoteline)	Curry's	Comet	D&G (Quoteline)
Price of DEG	£200	79	75	59	119	145	144
	£400	139	170	86	169	185	158
	£800	259	255	112	195	195	178
	£1000	259	255	112	195	195	178

Notes: (i) Does not take into consideration quality dimensions or different terms.

Source: Competition Commission report, Appendix 11.3.

G.29 For televisions, at least, there was a very large difference between the extended warranty prices in 2002, while a gap also existed for washing machines. These figures suggest the assumptions on price differences are not unreasonable.²⁶

G.30 Next we calculate how many customers are paying P_M and how many are paying P_c . From the Competition Commission consumer survey we know that in 2002 customers purchased 82 per cent of extended warranties from point-of-sale suppliers. We therefore assume that in 2002, 82 per cent of the market was paying P_M , and the remainder was paying P_c . One interpretation of this approach is that there are separate markets for point-of-sale extended warranties and non-point-of-sale extended warranties. We assume that the markets are separable because some consumers have limited information about non-point-of-sale

²⁶ Note that the Competition Commission report's finding that retailers could have priced a third lower if they did not earn ROCE above WACC is not strictly the same as meaning the actual price would have been the same as insurers. Comparing the ROCE to the WACC takes into account different levels of service quality (that is, differences in the costs of supplying the extended warranty) but prices do not. We use these price comparisons as a sense check rather than to identify actual price ratios. In the subsection below we use a sensitivity analysis to check how the results change if non-point-of-sale suppliers do not price at competitive levels.

suppliers. The former operates as a complex monopoly as in Chart G.2, the latter is fully competitive as in Chart G.1.

G.31 The Competition Commission estimated that the total size of the market was £892 million in 2002.²⁷ Therefore an approximation of the proportion accounted for by point-of-sale suppliers is 82 per cent of this, which is £731 million.

G.32 Using these figures we use the following formula to calculate the consumer detriment arising from the transfer (where $P_M \times Q_M$ equals £731 million):²⁸

$$\text{Transfer} = P_m \times Q_m \times \left(\frac{P_m - P_c}{P_m} \right)$$

G.33 In addition to the transfer between consumers and suppliers we also calculate the deadweight loss. To estimate the deadweight loss we multiply the transfer by 50 per cent. This is a rule of thumb that one can use if marginal costs are constant.²⁹ Therefore the deadweight loss is:

$$\text{DWL} = \frac{\text{Transfer}}{2}$$

G.34 Using these assumptions we find that in 2002 the transfer was £244 million and the DWL was £122 million.

²⁷ See Competition Commission report, Table 4.6.

²⁸ The transfer could more easily be calculated as $\text{Transfer} = Q_m \times (P_m - P_c)$ although in this instance we do not have absolute figures for the prices but only a ratio.

²⁹ If marginal costs are constant then the marginal revenue curve will intersect the marginal cost curve exactly halfway between the vertical axis and where the demand curve intersects the marginal cost curve.

Consumer detriment in 2007

- G.35 We now calculate the consumer detriment in 2007. We use the same approach to calculating detriment as for 2002. We calculate what we call our 'base model'. This is the estimated change in consumer detriment based on the assumptions set out in Table G.4 above. At the end of this section we analyse the sensitivity of our base model result to changes in these assumptions.
- G.36 For our initial base model we have assumed that the residual demand and supply curves are unchanged. The basis for this assumption is that the penetration rate for extended warranties has not changed significantly. A possible counterfactual is that in the absence of the Order the penetration rate may have increased, leading to a greater detriment. However, we have taken a conservative approach to our estimation.
- G.37 We also assume that quality levels have not changed as a result of the Order. The evidence was inconclusive on this point, so this may not be correct. However, in keeping with a conservative approach, we do not assume any improvement in service due to the Order.³⁰
- G.38 Lastly, we assume that the point-of-sale suppliers' share of supply has fallen to 68 per cent, which is a result from our consumer survey. As mentioned above this is the main driver of the difference in detriment between 2002 and 2007 in our base model. We assume that the 14 per cent of customers who no longer buy from retailers at monopoly prices instead purchase from non-point-of-sale suppliers at competitive levels.
- G.39 Using these assumptions we find that in 2007 the transfer was £202 million and the DWL was £101 million.

³⁰ In our sensitivity analysis subsection we look at the impact if the Order had improved the product offerings of the point-of-sale suppliers.

Change in detriment between 2002 and 2007

G.40 The change in annual detriment between 2002 and 2007 is £366 million - £303 million = £62 million.

Allocating the consumer benefit

G.41 Our base model calculates that between 2002 and 2007 there has been a reduction in annual consumer detriment (or increase in consumer benefit) of £62 million. We would like to allocate this benefit between the factors that caused it. These factors might include both the Order and the publicity surrounding the Investigations, as well as other factors unconnected with the Investigations.

G.42 First, we adjust the benefits to account for the increase in supply of free extended warranties by manufacturers. In our base model the change in consumer benefit and detriment is caused by consumers switching from point-of-sale to non-point-of-sale suppliers. Some of these 'purchases' may have been consumers taking advantage of free promotional extended warranties offered by manufacturers. Although this represents a benefit to consumers, this benefit cannot be attributed to the Investigations or the Order.³¹ Therefore, we exclude from our calculations any benefit that accrued from free extended warranties.

G.43 In Chart 5.10 we showed that the proportion of extended warranties that manufacturers accounted for increased by 13 percentage points (from 4 per cent to 17 per cent). However an analysis of customers who received their extended warranty for free reveals that around three-quarters (1.5/2.1) of the increase in the penetration rate of manufacturer

³¹ Stakeholders told us that the increase of free promotional extended warranties was a dimension of competition in the supply of DEGs. Manufacturers introduced free promotion extended warranties in order to provide a positive signal to consumers regarding the reliability of their products.

extended warranties was due to free extended warranties.³² In our base model we assumed that there was a reduction in the share of supply of point-of-sale suppliers of 14 percentage points.³³ If we assume that, of this, 9.3 percentage points ($1.5/2.1 \times 13$) were due to free manufacturer extended warranties then only 4.7 percentage points of the switch is potentially due to the Order. That is, around one-third of the change in consumer detriment is potentially due to the Order. The available annual consumer benefit potentially due to the Order becomes £21.0 million.³⁴

G.44 Second, we adjust the benefit to account for those factors that prompted customers to shop around. Under our assumptions the change in consumer benefit results from customers switching from retailers (point-of-sale suppliers) charging monopoly prices to non-point-of-sale suppliers charging competitive price levels. Therefore to allocate the benefit we have looked at the factors that caused customers to shop around. The most relevant piece of evidence to show this is the consumer survey. Question 13 of the consumer survey asked those customers who shopped around what prompted them to do so. The results are set out in Table G.6 below.

³² See Competition Commission consumer survey 2002 Q23, Q27. Mintel. 2006. *Extended Warranties, Financial Intelligence*, November 2006.

³³ That is, $82\% - 68\% = 14\%$.

³⁴ £21 million = £62 million \times 4.7/14.

Table G.6: 'What prompted you to compare products?'

	Actual	Share of influence
Display price and duration	51%	35%
Salesperson mentioning other suppliers	40%	27%
Leaflet saying there was other suppliers	26%	18%
Other reasons	24%	16%
Don't know	5%	3%
Total	146%	100%

Notes: (i) Multiple responses allowed.

Source: Marketing science consumer survey, Q13.

G.45 Table G.6 shows the responses to the question: 'What prompted you to compare products?' by all those respondents to the consumer survey who considered alternative extended warranty products to those supplied by retailers. We allowed multiple responses to this question, so the column on the far right shows the weighted proportion, which we use to allocate the benefit.

G.46 Looking at Table G.6, 'Display price and duration', 'Sales person mentioning other suppliers' and 'Leaflets saying there were other suppliers' appears to be attributable to the Order. Some of the category 'Other' might be due to the awareness created by the investigation process or other features of the Order that Q13 did not capture. Therefore we have attributed a proportion of this (half of the 16 per cent) as a benefit of the Investigations and the Order. Taking account of all these factors relating to the Order, the annual benefit due to the Order is £18.6 million.³⁵

³⁵ £18.6 million = £21 million x (35% + 27% + 18% + 8%).

Net present value calculation

- G.47 We have estimated that the (non-discounted) change in consumer detriment due to the investigations and the Order is £18.6 million per year. At the same time, we have estimated that compliance with the Order imposed on retailers a one-off cost of £4.9 million. Compliance with the Order is also likely to have imposed on-going costs on retailers but, on the basis that these costs are unlikely to be significant and also due to the lack of data, we have assumed that those costs are zero. A correct comparison between the net change in consumer detriment and the cost of the investigations requires converting the benefits and costs into a net present value (NPV).
- G.48 We set out the discounted values of the benefits and costs in tables at the end of this annex. We have used 2005 (the year that the Order was implemented) as the base year for our calculation. In other words, we have calculated the value of the net benefit as if it were a return on an investment made in 2005. The discount rate that we use is 3.5 per cent, which is the rate HM Treasury recommends for a cost benefit analysis to determine whether government action can be justified.³⁶
- G.49 The NPV is for the benefits that the Order has accrued so far (three years of benefit). We anticipate that there will be more in the future but do not attempt to quantify them. This represents a conservative approach to estimating benefits, since we would in practice expect the benefits to continue for longer than three years.
- G.50 Using this approach the NPV of the change in consumer detriment due to the investigations and the Order, taking account of the one-off compliance costs imposed by the Order, is **£51 million** at 2008 prices.

³⁶ HM Treasury, *The Green Book*. See <http://greenbook.treasury.gov.uk/>

Sensitivity analysis

G.51 Our estimate of the impact of the investigations and the Order on the extended warranty market is based on a number of assumptions which were listed in Table G.4. We have tested what happens to the results if we vary some of those assumptions. We tested the impact of the following:

- Non-point-of-sale suppliers do not offer extended warranties at fully competitive prices.
- Point-of-sale suppliers reduce their prices or improve the quality of their extended warranties between 2002 and 2007.
- On-going costs are not zero.

Non-point-of-sale not fully competitive (that is, price above marginal cost)

G.52 We have assumed in our base model that customers that purchase their extended warranty from a non-point-of-sale supplier are able to purchase at a competitive price level. But it is possible that non-point-of-sale suppliers are pricing at some level higher than the competitive level. Although the Competition Commission found that insurers did not have a ROCE above WACC, it may have been simply because they had a higher cost base. If non-point-of-sale suppliers priced higher than competitive levels it will reduce the benefit because consumers that have switched from point-of-sale suppliers to non-point-of-sale suppliers will not capture the entire consumer surplus available (as we have assumed in the base model).

G.53 In the table below we set out the scenario if non-point-of-sale suppliers priced at 5, 10, 15 or 20 per cent above competitive levels.

Table G.7: Impact of non-point-of-sale suppliers pricing above competitive levels (in 2008 prices)

Price above competitive levels	Benefits (£million)	Costs (£million)	NPV (£million)
0% (base)	56.4	5.1	51.3
5%	48.0	5.1	42.8
10%	39.5	5.1	34.4
15%	31.0	5.1	25.9
20%	22.6	5.1	17.4

G.54 The table shows that the results are sensitive to the assumptions about the competitiveness of the non-point-of-sale suppliers. If non-point-of-sale suppliers do not price at competitive levels the benefit of encouraging customers to switch away from point-of-sale suppliers falls. However, for all price levels considered in the table the net benefit remains positive. Even if non-point-of-sale suppliers priced at 20 per cent above competitive levels then there would still be a net gain of £17.4 million.

Point-of-sale suppliers reduce prices/improve quality vis-à-vis non-point-of-sales due to the Order

G.55 We have assumed in our base model that point-of-sale suppliers have not improved their product offering in response to the change in consumer shopping patterns. The reasons for this is that our data is inconclusive on whether the product offer has improved, it is difficult to quantify changes in product offer, and it is not clear what change in the product offer is attributable to the Order. The implication of assuming that the point-of-sale offer is unchanged is that all those consumers that still purchase from a point-of-sale supplier are assumed to continue to pay a monopoly price.

- G.56 If instead point-of-sale retailers have improved their product offering due to the Order, the model will underestimate the benefit from the Order. If the point-of-sale offer has improved then there is benefit for both consumers who switched to non-point-of-sale suppliers, but also those who choose to continue to purchase from the point-of-sale suppliers.
- G.57 In our base model we have assumed (in accordance with the Competition Commission's estimates) that the point-of-sale suppliers could have priced one-third lower. That is, competitive prices were 33 per cent lower than monopoly prices. In Table G.8 below we set out the impact on the NPV if the difference between the price of extended warranties offered at the suppliers' point-of-sale in 2007 and the competitive price had reduced to 30, 25 and 20 per cent.³⁷

Table G.8: Impact of point-of-sale suppliers improving offer (in 2008 prices)

Competitive prices below POS prices (2007)	Benefits (£million)	Costs (£million)	NPV (£million)
33% (base)	56.4	5.1	51.3
30%	83.8	5.1	78.7
25%	125.0	5.1	119.8
20%	166.1	5.1	160.9

- G.58 Table G.8 shows that the results of the base model for NPV is sensitive to small changes in the extended warranty offer of the point-of-sale suppliers. A small improvement in the point-of-sale suppliers' offer increases the size of the consumer benefit significantly. Therefore if we

³⁷ Or equivalently, an increase of quality to the same value.

assume that the Order has had an impact on the point-of-sale offer, then the benefit from the Order would be much larger than the base model.

Estimation of on-going costs

G.59 Retailers did not provide us with any data on ongoing costs. Below we set out some assumptions on the level of ongoing costs that the Order might have imposed on retailers.

G.60 We made the following assumptions:

- Retailers devote time to train staff on compliance with the Order ('compliance training cost'). We have assumed that the compliance training cost is 1 hour per staff member per year (5 minutes per month). This is calculated as:

Annual compliance training costs = total DEG employees x 1 x hourly wage costs

- Retailers devote additional time to re-ticketing prices on DEGs, since they will have to adjust prices not just for changes in DEG prices but also changes in the price of the extended warranty ('re-ticketing cost') for a particular DEG. We have assumed that re-ticketing takes one staff member per store an additional one hour per month.³⁸ This is calculated as:

Annual re-ticketing costs = total DEG stores x 12 x hourly wage costs

- Retailers devote additional time to other activities that arise due to the Order ('other Order costs'). For example, additional time spent

³⁸ Although this may seem like a small amount of time per month, we note that the extended warranty prices are normally on the same ticket as the DEG price. Furthermore the extended warranty price is normally linked to the DEG price so both are likely to be changed at the same time.

restocking leaflets and monitoring store compliance.³⁹ We have assumed that other Order costs are equivalent to one hour per month of one staff employee per store. This is calculated as:

Annual other Order costs = total DEG stores x 12 x hourly wage costs

G.61 We do not have any data on the number of staff selling DEGs or the total number of stores selling DEGs. We have therefore estimated the total number of employees selling DEGs and total number of DEG stores based on DSG's employee and store numbers in 2005 (as reported in its 2005 Annual Report).⁴⁰ We have assumed that DSG's share of all employees selling DEGs in 2005, and its share of the total number of DEG stores in 2005, were proportional to its market share.⁴¹ The calculations we have used are:

$$\text{Total DEG employees 2005} \approx \frac{\text{No. of DSG employees 2005}}{\text{Market share of DSG 2005}}$$

$$\text{Total DEG stores 2005} \approx \frac{\text{No. of DSG stores 2005}}{\text{Market share of DSG 2005}}$$

³⁹ We do not include an additional cost for printing leaflets since all retailers printed leaflets prior to the Order, and the evidence (see Section 5) suggests there has not been a significant increase in the availability of leaflets. We do not believe the requirement under the Order to provide leaflets has imposed a material increase in on-going costs for retailers.

⁴⁰ DSG's UK retail stores include: Dixons, Curry's, PC World, and The Link. We used DSG to estimate the number of stores because it listed the number of stores and employees it had in its annual report, and we had an estimate of its market share.

⁴¹ We used DSG's market share from Mintel. 2006. *Extended Warranties, Financial Intelligence*, November 2006, p. 28.

- G.62 We have assumed a wage cost of £10 per hour.⁴² Assuming a 30 per cent up lift for non-wage labour costs (such as pensions and national insurance) implies a cost per employee per hour of £13.
- G.63 Using these assumptions implies that total on-going costs are £1.8 million per year, although we expect that the actual level of on-going costs will be lower than this.⁴³ The NPV value of this on-going cost over three years is £5.6 million. Therefore to calculate benefit net of on-going costs, this would have to be subtracted from the total NPV benefits calculated in the sections above, that is the NPV of benefits would fall to £46 million.
- G.64 In other words, our estimate of the benefits of the Order is not significantly affected by any plausible assumption on the level of on-going costs.

Conclusion on consumer detriment

- G.65 We have estimated that the NPV of the Investigations and the Order is £51 million. However this estimate relies on a number of assumptions. We find that the results are sensitive to changing some of the key assumptions. For instance:

⁴² We believe £10 per hour is a reasonable estimate for the cost of retail staff. A search for retail jobs at www.reed.co.uk indicates that retail jobs are available for around £13,000-25,000. That would imply an hourly wage of around £6-£12. Data from the National Statistics found that, in April 2003, 77 per cent of workers in the 'Wholesale and retail trade' sector earned less than £10 per hour. See www.statistics.gov.uk/StatBase/Expodata/Spreadsheets/D7429.xls, available 28 April 2008. We have added 30% to this as an estimate to cover non-labour costs.

⁴³ We believe these calculations represent a conservative approach to estimating costs in that they are likely to overstate actual ongoing costs. The stakeholders generally told us that the Order did not add significant on-going costs although some costs are hard to quantify. Furthermore there is some evidence (see Section 5) that retailers are not fully complying with the Order, and therefore may not be incurring all of these costs.

- If we assume non-point-of-sale suppliers price above competitive levels the benefit falls. The net benefit from the Order however remains positive over a plausible range.
- If we assume that point-of-sale suppliers improved their extended warranty offer over the period, and that the change was due to the Order, then the benefit increases significantly.
- Although in our main calculation we do not include on-going costs, these are unlikely to be significant. Any plausible estimate of on-going costs is small in comparison to the total benefit we estimate.

Data

Table G.9: Benefit inputs

	2002	2007
Total extended warranties sales	£892.5 million	£892.5 million
Retailer price above competitive levels	33%	33%
Non-retailer price above competitive levels	0%	0%
DWL (% of transfer)	50%	50%
<i>Channel market shares</i>		
Retailer	82%	68%
Manufacturer	4%	17%
Insurer	4%	6%
Credit card scheme	2%	0%
Bank	1%	2%
Other	3%	3%

Don't know	4%	4%
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Table G.10: Costs inputs

One-off costs	£4.9 million
Total ongoing costs per year	0
OFT investigation costs (2001 and 2002)	£1 million
Competition Commission investigation costs (2002 and 2003)	£3.2 million

Table G.11: Outputs (£ millions)

	2002	2007
Transfer	243.9	202.3
DWL	122.0	101.1
Total detriment	365.9	303.4
Difference in detriment (2002 - 2007)		62.5
Reduction to account for free EWs		41.4
Total available for allocation		21.0
<i>Allocation per year due to Order</i>		
Display price and duration		7.3
Sales person mentioning other suppliers		5.8
Leaflet saying there was other suppliers		3.7
Other reasons		1.7
Total		18.6

Net present value calculations

G.66 We set out below the data used for the NPV calculation. NPV is calculated using the following formula.

$$\text{NPV} = \frac{x_n}{(1 + \text{discount rate})^n}$$

Where 'x' is the amount realised in period 'n'.

G.67 As the Treasury recommends, we use a discount rate of 3.5%.

Table G.12: Base model NPV calculation

	2005	2006	2007
Nominal values			
The Order	£18.6 million	£18.6 million	£18.6 million
One-off costs	(£4.9 million)		
2005 NPV			
Year relative to base year (2005)	0	1	2
Discount factor	1.00	1.04	1.07
The Order	£18.6 million	£18.0 million	£17.4 million
One-off costs	(£4.9 million)		

G.68 When one sums the benefits and subtracts the costs, the NPV (based on 2005 prices) is £49 million. (Or £51 million in 2008 prices, adjusting for CPI.)