



Introduction to the Carbon Reduction Commitment Energy Efficiency Scheme and One Compliance Strategy



Environmental Markets Summit

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Passion. Expertise. Results.



Outline

- n **What is the CRC?**
- n **Impacts of the CRC**
- n **Establishing the Organizational Group**
- n **The League Table**
- n **Performance Metrics**
- n **Recycling payments**
- n **Emissions Trading**
- n **Business Implications**
- n **Strategies for Improving Performance**
- n **Case Study**
- n **Key Actions**

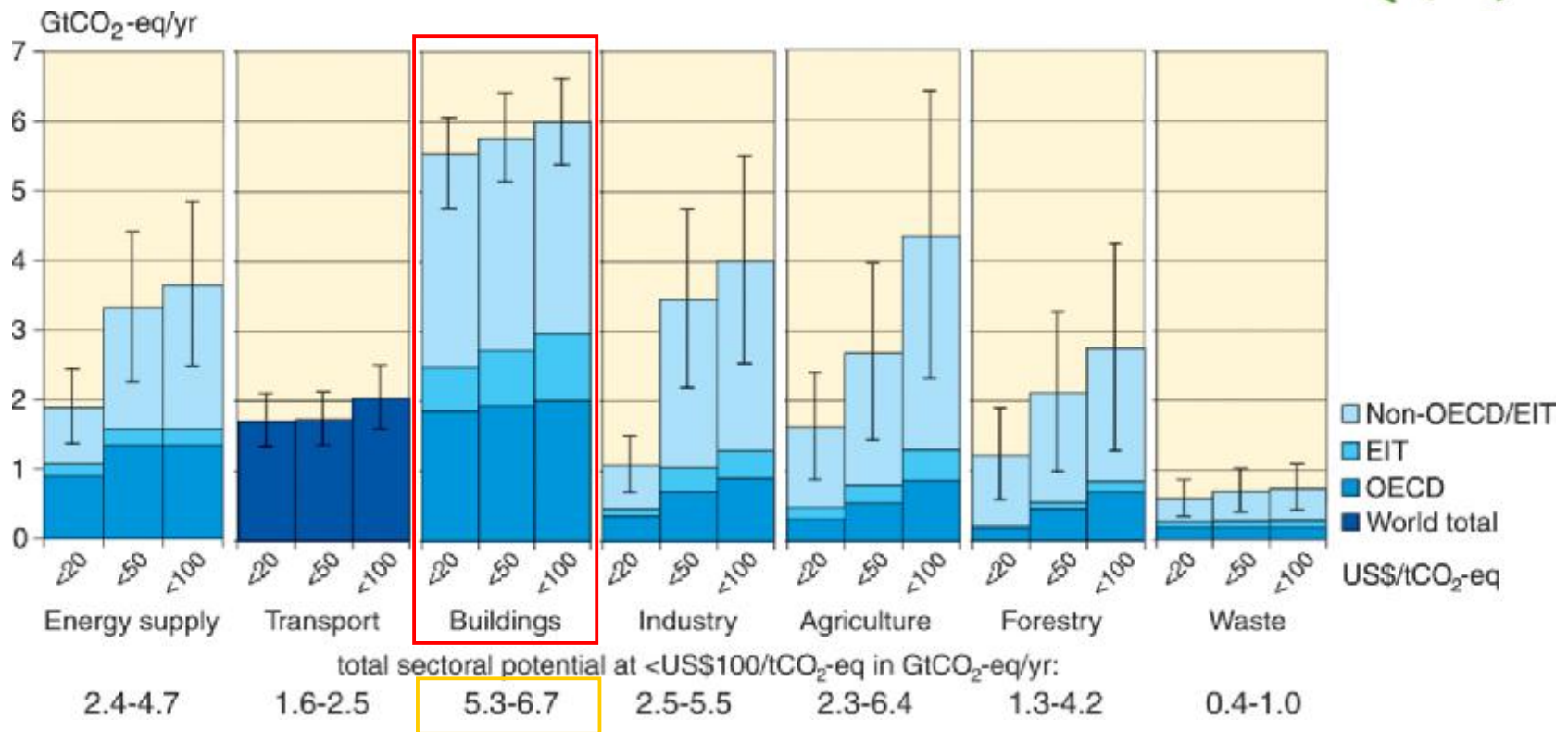


What is the CRC?

- 1. Mandatory carbon cap and trade program in UK**
- 2. Applies to organizations whose building(s) annually consume over 6,000 MWh of electricity**
- 3. Starts NOW**
 - 1. Registration opened in April 2010 and closes in September 2010.**
- 4. The program is meant to be revenue neutral from a macro-economical point of view. All funds that participants expend in compliance are recycled back annually.**



Why Buildings?

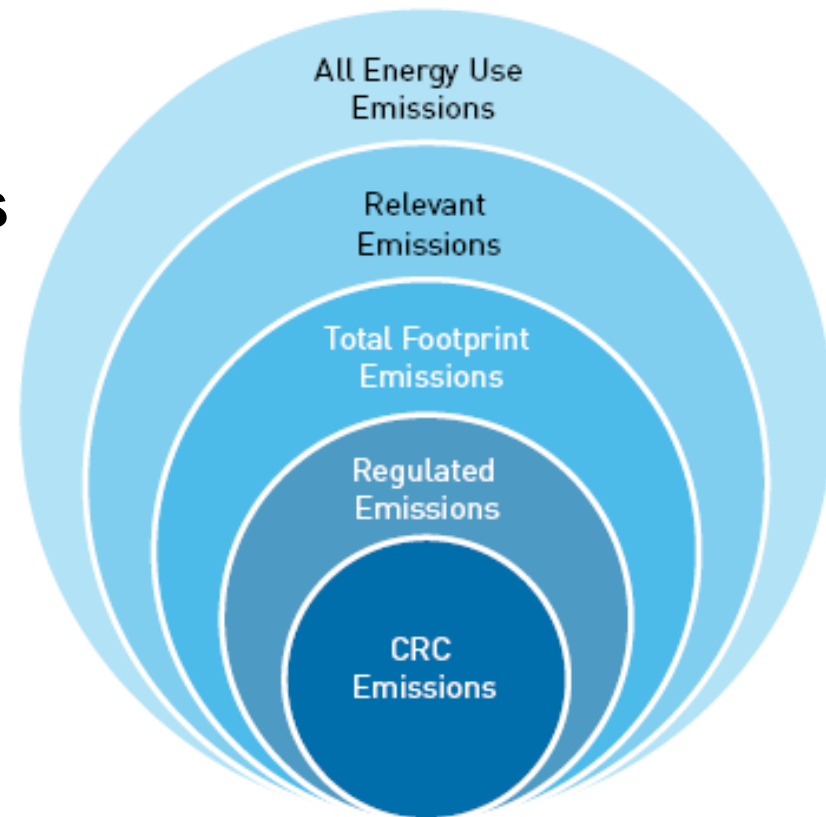


<http://www.ipcc.ch/graphics/syr/fig4-2.jpg>



Impacts of the CRC

- n Regulates around **10% of the emissions** in the UK
- n Around **5,000 organizations in the UK** will be regulated
- n For the first phase of the CRC (first three years of the program), the **costs/benefits will be around 3%** of an entity's electricity spend.

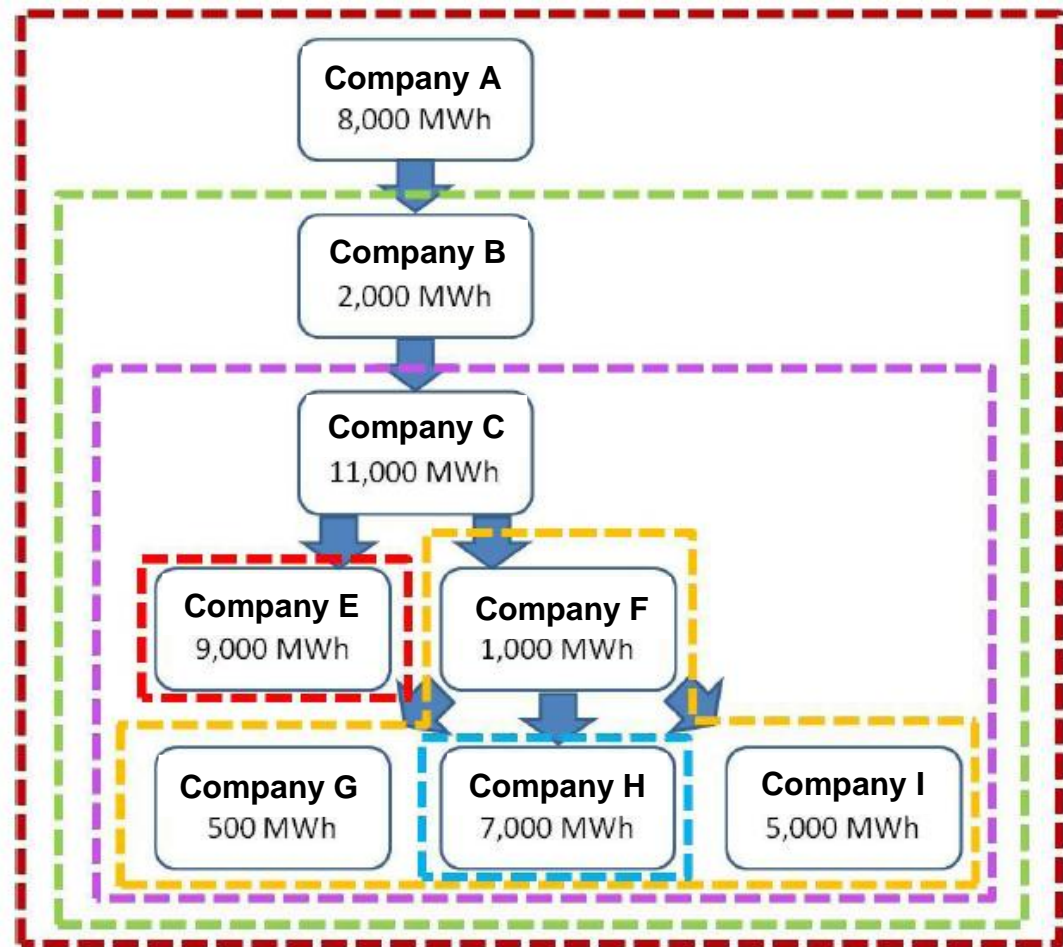




Establishing the Organizational Group

Diagram presents Primary Group vs. Significant Group Undertaking (SGU) within a Participant for reporting purposes

- Each colored, dotted box delineates a SGU grouping
- SGU can be either a single entity or a group of constituent entities





Unique Components of the CRC

- n League table
- n Performance metrics
- n Recycling payments

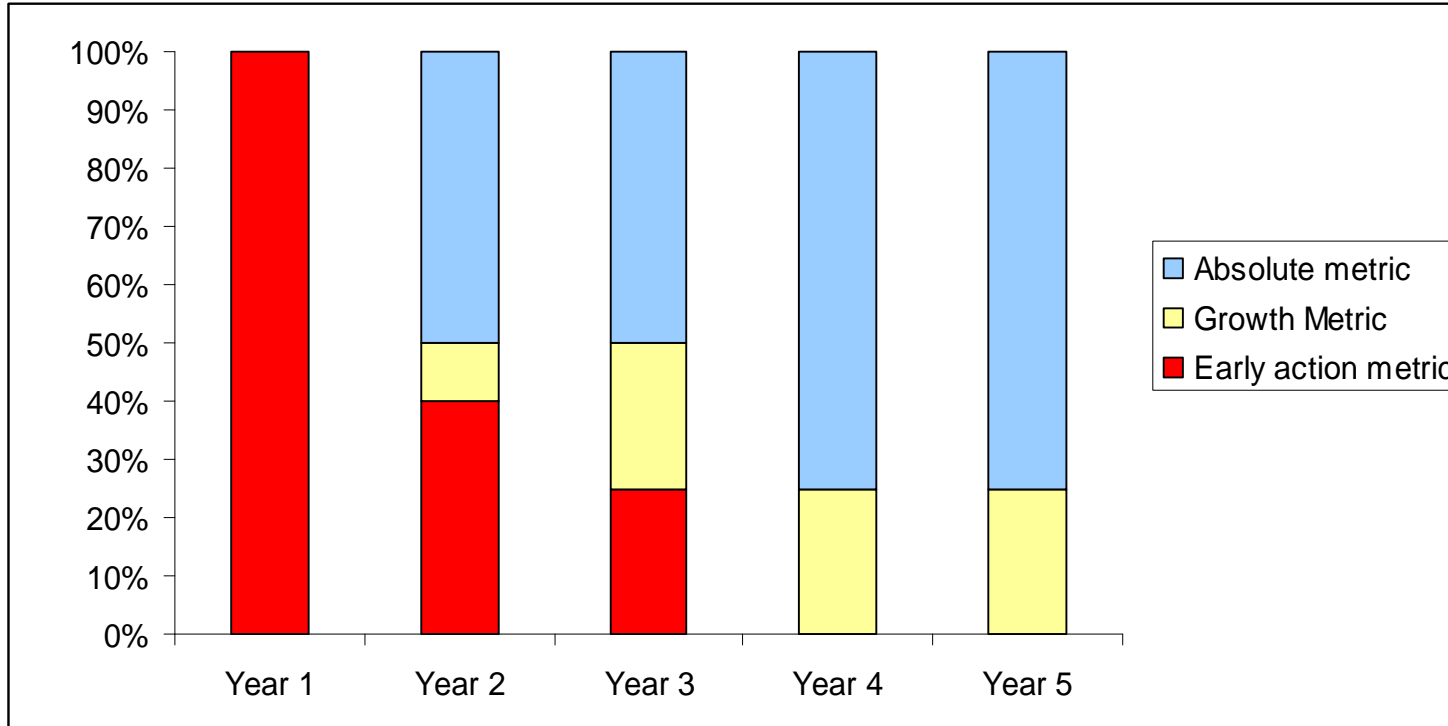


League Table

- n The League Table will record:
 - Overall position based on performance under these metrics:
 - 4 Early Action Metric
 - 4 Growth Metric
 - 4 Absolute Metric
 - The Early Action metric will account for 40% of a participant's overall performance in the second year of the CRC

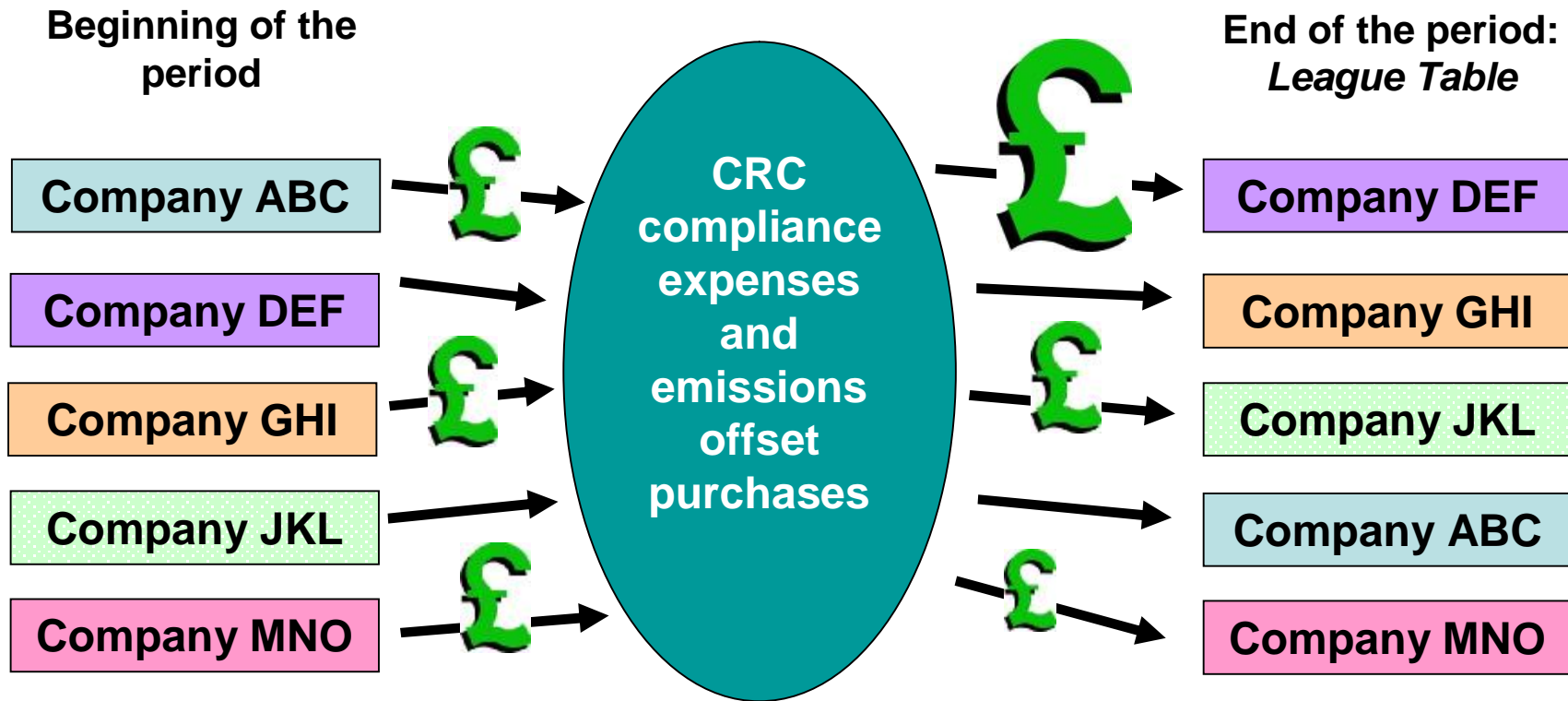


Performance Metrics





Recycling Payments





Emissions Trading

n Calculating emissions

- Standard calculations which involve multiplying the energy use by a defined emissions factor.
- Emissions from onsite fuel consumption are also included in the scheme and need to be accounted for.

n The process of offsetting emissions

- Purchase offsets in the beginning of the compliance period
- Must surrender carbon allowances at the end of each period
- The amount surrendered must equal the amount of emissions calculated from energy consumption
- Failure to comply gives rise to **fin**es and **public shaming**



Emissions Trading *Auctioning*

- n Phase 1 *Learning Phase* - April 2010 – March 2013
 - £12 (\$19)/tCO₂ fixed price uncapped sale

- n Phase 2 *Capped Phase* - April 2013 – March 2018
 - Sealed bid uniform price auction – These prices will be the basis for the government’s offset price development.
 - Secondary market – buying from those who have offsets to part with
 - Safety valve – injection of offsets from the ETS if the cost per offset increases too much



Business Implications

What's the \$\$ impact?

- n Administration fees
- n Penalties
 - Reporting delays
 - Reporting errors
- n Allowance purchases
 - Cash flow requirements
- n League table performance
 - Reputational impacts
 - Recycle payments
- n ...and finally, the cost of buying more energy than is necessary.





Administration *Fees and Penalties*

Civil and Criminal Penalties

Administration fees

- n Registration fee - \$1,520 (£950)
- n Subsequent annual admin fees - \$2,100 (£1,290).

Fines

- n Late reporting: **one month = \$24,400 (£15,000)**
- n Reporting error: **10% error at £40/tCO₂ = \$92,800 (£58,000)***

* = based on an organization with 29,000t CO₂ footprint



Business Impacts

- n Cost and reputational impacts need to be managed
- n Due diligence required on UK asset or corporation transactions
- n Impacts on existing and new business and customer relationships
- n Drives market for energy efficiency and carbon trading

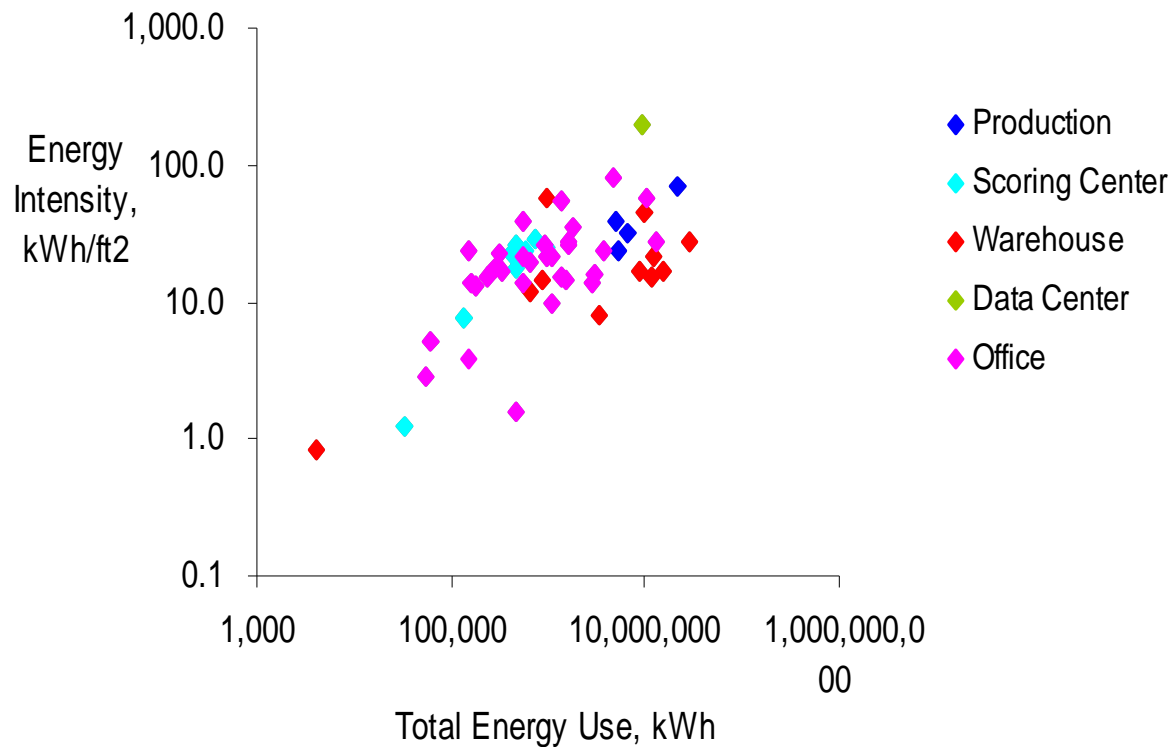


Managing the Risks of the CRC

- n Focus on energy use reduction through a company's portfolio of properties. By doing this a company can:
 - Improve its standing in the league table
 - Decrease its compliance fees associated with offset purchases
 - Decrease its overall energy use expenses
- n Develop an energy use data collection and monitoring strategy to limit the potential for misreporting and extraneous legal costs.

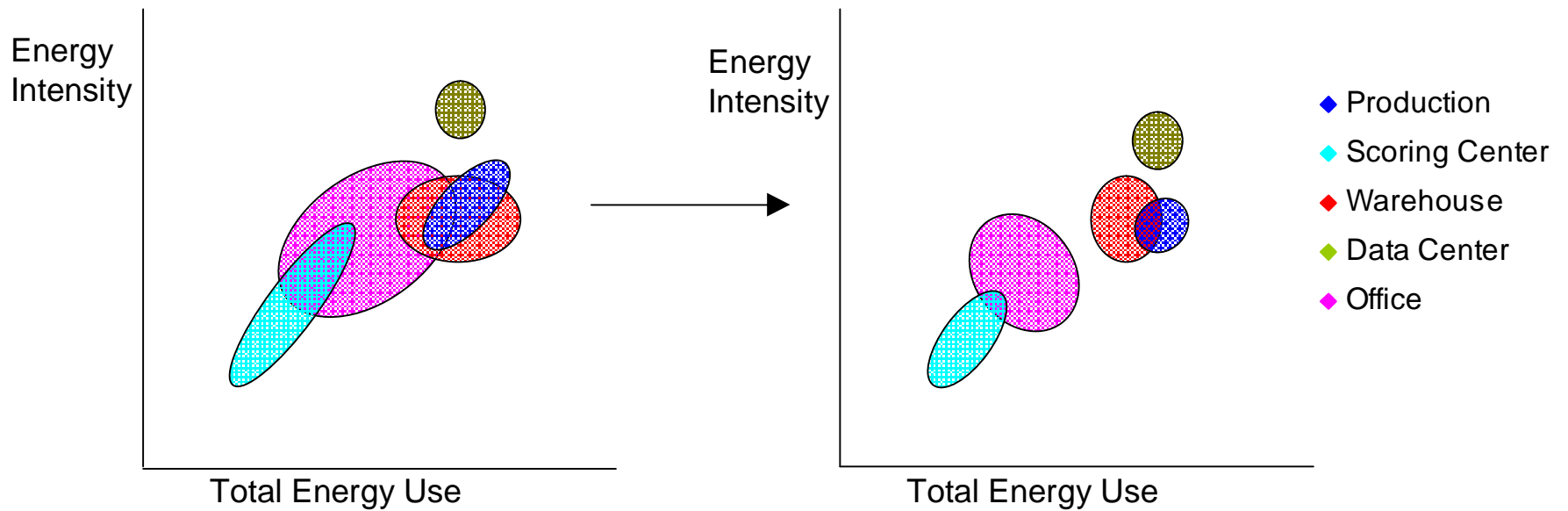


Gradual Reduction of Energy Use in a Portfolio





Gradual Reduction of Energy Use in a Portfolio



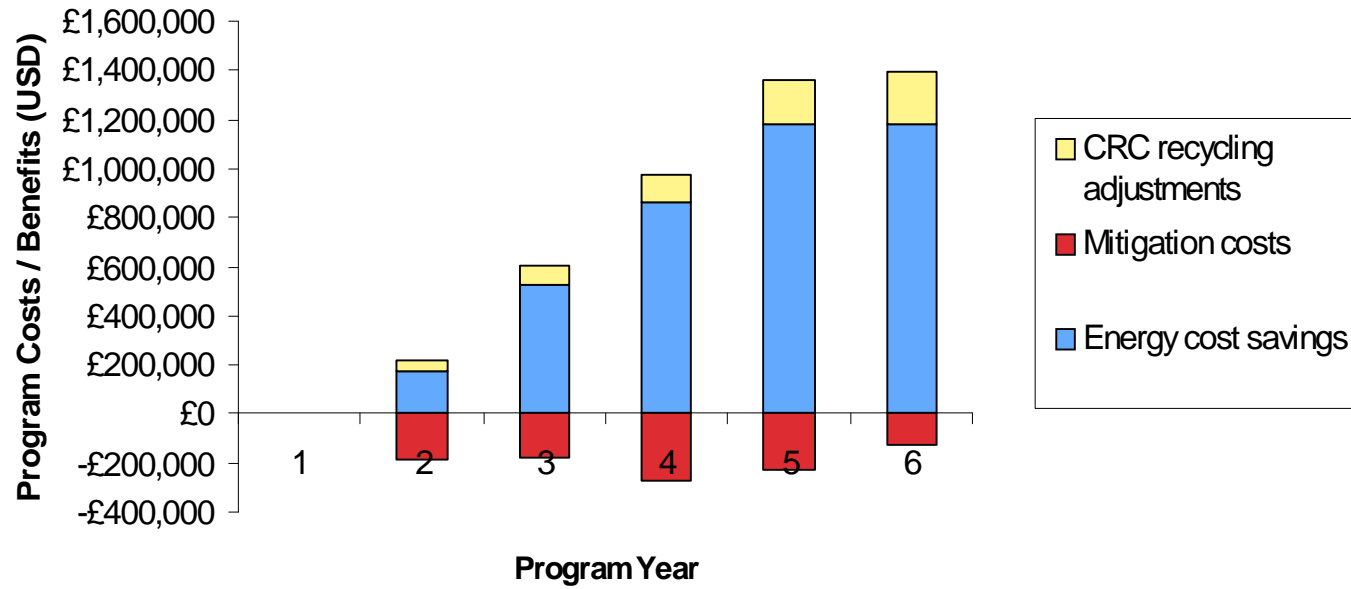


Case Study

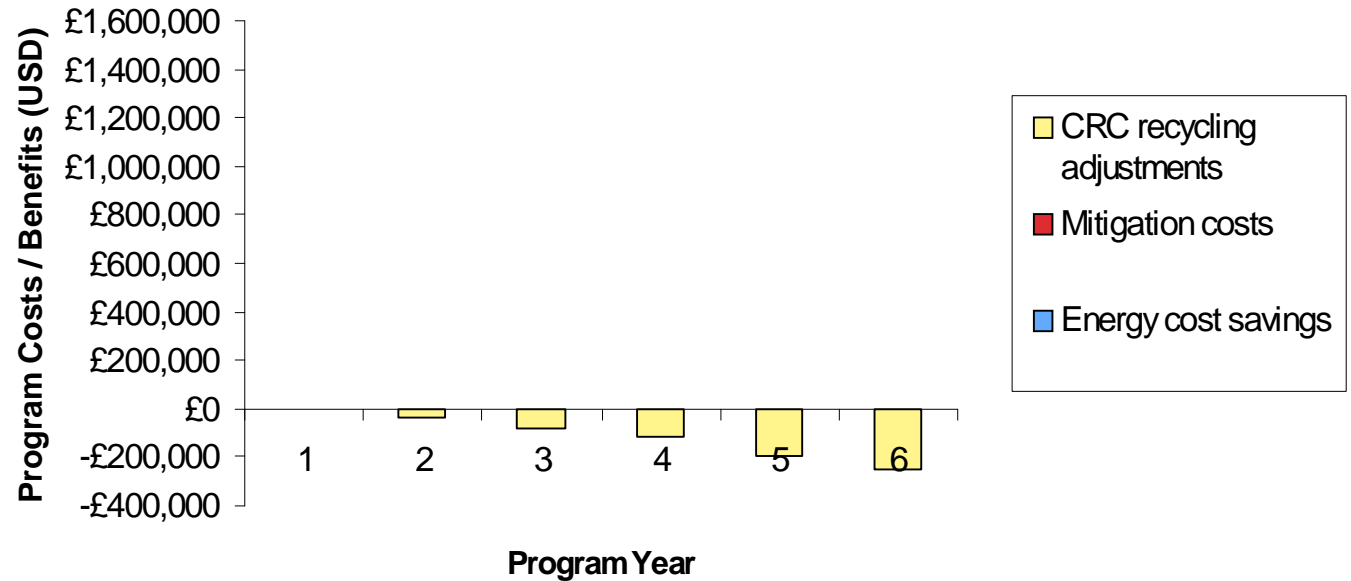
UK based organization – real data extrapolated to determine costs and benefits associated with the program.

- n Spends \$14,406,360 (£8,860,000) on electricity
- n Consumed 61,520,000 kWh
- n Emits 33,282 TCO₂e
- n Purchases around **\$650,000 (£400,000)** of offsets for CRC compliance in the first phase

Best Case Scenario:
Performing at the top of the League Table



Worst Case Scenario:
Performing at the bottom of the League Table





Case Study

Value that is at stake for this specific case is **\$9,000,000**
(£5,500,000) over the six year period.

Recycling Payments (£)	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
	0	80,000	160,000	230,000	380,000	465,000

Energy Savings (£)	Year 1	Year 2	Year 3	Year 4	Year 5	Year 6
	0	177,000	525,000	857,000	1,100,000	1,100,000



Key Deadlines

Action	Deadline
Register using online registry	30 th September 2010
Buy allowances from government for compliance year 2	End of April 2011
Submit Footprint Report and Annual Report using online registry	29 th July 2011
Hold sufficient allowances in account to cover emissions	29 th July 2011



Key Actions

- n Support CRC administration process
- n Determine the potential CRC liability
- n Develop a strategy to perform well in the League Table
- n Develop an auctioning strategy

Thank you.

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