Teacher Instructions

Traditionally, A-level economics has taught us that the market failures of positive and negative externalities, and merit / demerit goods can be tackled through a standard selection of policies such as indirect taxation, subsidies, information provision or regulation.

What if we could harness the power of behavioural science insights, though, to develop more engaging, and even playful, solutions?

This resource helps students to understand the wider range of policy options available to policy makers when trying to correct market failure, and can be used when teaching behavioural economics or when teaching market failure.

Students should start by looking at the policy grid, which contains information on the traditional approaches. In small groups, they should then discuss more engaging solutions, adding notes to the grid and assessing the pros and cons of their proposed solutions. As a plenary, they could compare their suggestions to some that have been used in “real life” – details of these are given below. Links to clips / videos / articles can be found on the Internet.

The first two rows of the table have been completed as a guide for students.

Some real-life solutions:

**Amsterdam airport toilets:** pop a fly sticker in the urinal and let the male instinct to aim take over to reduce your cleaning expenses. www.urinalfly.com

**The musical stairs:** makes the stairs more fun than the escalator
www.thefuntheory.com/piano-staircase

**Underpayment in honesty boxes:** stick a pair of Big Brother eyes over the honesty box and watch the money roll in
http://news.bbc.co.uk/1/hi/health/5120662.stm

Play Nicely!
Parisian cyclists: stick new signs to existing traffic lights so that cyclists can turn right or go straight on at traffic lights once they’ve checked for traffic
www.bbc.co.uk/news/magazine-33773868

Singapore late tax payments: the government there changed the colour of their reminder letters from white to pink, to match the colour of paper used by phone and utility companies for late payment reminders
www.challenge.gov.sg/print/cover-story/a-tip-for-policy-making-nudge-not-shove

Copenhagen’s litter solutions: bins placed alongside cycle lanes in Copenhagen are now angled with a wide “mouth” so that cyclists can aim litter straight in without having to stop; Copenhagen also recently reduced littering in the city centre by painting bins a vivid green colour and painting green footsteps onto the pavements to encourage people to walk to the bins and use them in the Clean Love Copenhagen campaign http://inudgeyou.com/copenhagen-implements-green-footprint-nudge/ . You could also look at this creative solution – the world’s deepest bin - www.thefuntheory.com/worlds-deepest-bin

Glass recycling: This scheme in Sweden has turned bottle banks into fun arcade-style games, increasing their use compared with conventional bottle banks by 50 times
www.thefuntheory.com/worlds-deepest-bottle-bank
<table>
<thead>
<tr>
<th>Scenario</th>
<th>Market Failure</th>
<th>Traditional Solutions</th>
<th>Playful / Engaging Solution</th>
<th>Advantages of your Proposal</th>
<th>Disadvantages of your Proposal</th>
</tr>
</thead>
<tbody>
<tr>
<td>Policy grid</td>
<td>Encourage more people to take the stairs rather than use escalators to reduce obesity problems.</td>
<td>Promote the usage of stairs and discourage the use of escalators.</td>
<td>Place musical piano steps next to the escalators.</td>
<td>66% increase in the number of people using the stairs next to the escalators.</td>
<td>Very cheap.</td>
</tr>
<tr>
<td>Underpayment</td>
<td>Many cyclists in Paris run red lights.</td>
<td>Implement fines and penalties for violating traffic rules.</td>
<td>Require cyclists to pass a test.</td>
<td>Encourage more people to follow traffic rules.</td>
<td>Oppose problems.</td>
</tr>
<tr>
<td>Negative externalities</td>
<td>Underpayment in “honesty boxes” for hot drinks in workplaces.</td>
<td>Introduce additional mechanisms to ensure payment.</td>
<td>Purchase a drinks machine that only produces hot drinks following payment.</td>
<td>Ensure compliance and reduce the risk of missing market.</td>
<td>Oppose problems.</td>
</tr>
<tr>
<td>Negative externalities</td>
<td>Many passengers in a hurry in the male toilets in Amsterdam airport making a mess around the urinals.</td>
<td>Increase the number of cleaning staff.</td>
<td>Place a sticker of a fly in each of the urinals and let the males instinct to aim take over!</td>
<td>Very cheap. Not everyone wants to look at a fly!</td>
<td></td>
</tr>
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<td>Demerit goods</td>
<td>Negative externalities – reduction in healthcare available for others.</td>
<td>Implement regulations on school meals, ready meals etc.</td>
<td>Place a sticker of a fly in each of the urinals and let the males instinct to aim take over!</td>
<td>Very cheap. Not everyone wants to look at a fly!</td>
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<td>Free-riding</td>
<td>Negative externalities / demerit goods – more risk of accidents, increase in road rage of car drivers.</td>
<td>Implement compulsory contributions e.g. deductions from salaries.</td>
<td>Require cyclists to pass a test.</td>
<td>Encourage more people to follow traffic rules.</td>
<td>Oppose problems.</td>
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Encouraging people to pay their income/company tax on time – large chunks of tax are late. Rubbish and litter alongside cycle lanes in Copenhagen, as cyclists can’t reach bins on the footpaths.

Lots of people recycle cans and paper but far fewer recycle their glass, which is actually very easy to recycle. Effectively free-riding on public services paid for by citizens who have paid their tax.

Opportunity cost to the government sending out reminders. Negative externalities, especially environmental, of litter.

Negative externalities, especially environmental, of no glass recycling.

Government sends threatening letters to non-payers; huge amounts spent on tax investigations; additional fines for late payments. Fines.

Regulations.

Increase taxes to pay for increased collection. Fines for non-recycling. Regulations.

Scenario | Market Failure | Traditional solutions | Playful / engaging solution | Advantages of your proposal | Disadvantages of your proposal
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RESOURCE | RESOURCE | RESOURCE | RESOURCE | RESOURCE | RESOURCE