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**EXTENSION**

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## **Extension Service Consumer Factsheet: "Paper or Plastic?"<sup>1</sup>**

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You've filled your shopping cart with fresh fruits, vegetables, cartoned and bottled milk, cereals and assorted foods. Now comes the dreaded moment at the checkout counter. The clerk looks at you and asks the question, "Paper or Plastic?"

Of course, you want to be environmentally correct and responsible, especially in a public forum like the supermarket. Paper sacks are made of a renewable resource while plastic bags come from petroleum. However, plastic bags use far less material by weight than paper sacks, and the plastic sacks are resistant to water, important for frozen foods or wet items. So which is the correct choice? How do you decide?

First, examine the primary purpose for the sack or bag: to get your purchases home intact and in acceptable quality. A large brown kraft paper bag can hold a large amount of dry goods effectively. Also, paper sacks are self-supporting due to paper's stiffness and strength. However, moisture on the products can cause the paper to weaken and fail under stress. Plastic bags are strong, light and insensitive to moisture. However, they are limp and easily deformed. Products can roll out of the package

when it is set down. So, look at which sack you prefer for the purpose of getting the products home without damaging the products' quality.

Next, what will you do with the sacks once they have performed this initial function? Both paper and plastic bags may be used for another job once they're at your home. Trash can liners, lunch sacks, dirty clothes containers or even childrens' school art projects are possible uses. The plastic bags work best in potentially wet activities while the paper sacks can support themselves without a supporting container. These secondary functions are means to reuse the sacks before they enter the waste stream.

What happens to your plastic bags when you return them for recycling? According to the Society for the Plastics Industry, plastic grocery bags are shredded and then pelletized. They can then be made into new products, such as industrial trash-can liners, flower pots, drain pipes and, of course, new plastic bags.

And your paper grocery bags? The paper in these bags is mostly used to make cardboard boxes. Grocery bags themselves do not usually contain any recycled paper.

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Basically, the choice of either type of sack is easily defensible based on its properties and function. The true environmental impact of these packages parallel their monetary cost rather closely. In either case, using the paper sack or the plastic bag multiple times before it enters the waste stream is the best choice you can make when deciding between "paper or plastic".