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HUMAN DIETS AND ANIMAL WELFARE: THE ILLOGIC OF THE LARDER

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ABSTRACT. Few moral arguments have been made against vegetarian diets. One exception is the “Logic of the Larder.” We do animals a favor by purchasing their meat, eggs, and milk, for if we did not purchase these products, fewer animals would exist. This argument fails because many farm animals have lives that are probably not worth living, while others prevent a significant number of wild animals from existing. Even if this were not so, the purchase of animal products uses resources that could otherwise be used to bring a much greater number of animals into existence.

KEY WORDS: animal welfare, farm animals, utilitarianism, vegetarianism, wildlife

It may be a credit to vegetarian diets that ethical arguments against them are difficult to find. One of the few exceptions is an argument sometimes called “The Logic of the Larder” (LL): We do animals a favor by purchasing meat, eggs, and milk, for if we did not purchase these products, fewer animals would exist (Stephen, 1896). LL results from the common notion that the supply of farm animals roughly follows the demand for their products; and the less common notion that the world is made better off by having more animals in existence.

The Logic of the Larder has a long history. Two of the most famous proponents of vegetarianism tried to knock the argument down (Salt, 1914; Singer, 1999) but variants of LL continue to be defended by several notable thinkers (Frey, 1983; Blackorby and Donaldson, 1992; Hare, 1993; Ng, 1995; Appleby, 1999, pp. 72–73; Sandoe et al., 1999; Grandin and Hauser, 2002; Pollan, 2002; Fearnley-Whittingstall, 2004, pp. 23–24; Posner, 2004; Scruton, 2004; Cowen, 2005). Although their arguments tend to be posed informally, proponents of LL would probably agree that for LL to commend purchasing an individual animal’s meat, eggs, or milk, six conditions must hold:

- C1. Bringing that animal into existence *could* be a benefit to that animal
- C2. The animal has/had a life worth living
- C3. The animal would not exist/have existed if not for the consumption of its meat, eggs, or milk

- C4. The animal will/would be replaced after her slaughter by another animal
- C5. The rearing of that animal does not prevent a greater number of animals with lives worth living from existing (or, more precisely, does not prevent a greater amount of moral value among other animals from existing)
- C6. The purchase of that animal's meat, eggs, or milk must produce more moral value than any alternative use of money¹

Past rebuttals to LL have depended on a rejection of one or more of these conditions. Salt (1914) and many others, since, rejected C1 on the grounds that existence could only be a benefit if it were preferable to non-existence, which is an impossible comparison. It turns out that acceptance of C1 also leads to conclusions that most people find morally repugnant (Parfit, 1984). But C1 has proved not so easy to reject (Sikora, 1978; Sumner, 1978; Parfit, 1984; Ng, 1989a, b; Broome 2004). Sapontzis (1987), Gruzalski (1989), Singer (1999), and Hare (1993) rejected C2 with respect to many animals raised in intensive farms. We agree, for reasons we discuss later. C3 and C4 are clearly true of farmed animals. Singer (1993, 126) has argued self-conscious animals are not "replaceable," but this may be relevant only for a minority of farmed animals, and it is not clear Singer's argument holds, even for them (Hart, 1980; Hajdin, 1990). Gruzalski (1989) and Singer (1999) rejected C5, arguing that farm animals' appropriation of land and feed probably prevents a large number of wild animals from existing, but they did not marshal evidence to support the claim. To our knowledge, no one has investigated C6.

Here we review evidence for C2, C5, and C6. In debating the merits of LL, we will rely only on assumptions that are necessary to support LL. We do not necessarily agree with all of these assumptions, but accept them provisionally for the purpose of engaging the many proponents of LL on their own grounds. First, we find strong reasons to believe that for many farm animals, C2 does not hold – many farm animals have lives that seem not worth living. Second, we find that C5 may hold for some animal foods – the number of farm animals created by chicken meat and egg purchases may be larger than the number of wild animals prevented from existing by these purchases. Third and last, we argue C6 does not hold – there are more cost-effective uses of our money than meat or egg purchases to increase the total number of happy animals in the world. We conclude that LL fails to justify personal omnivory. We then explore the consequence this conclusion has for

¹ Although LL is commonly presented in utilitarian terms, it needn't be so, and the moral value in C6 needn't necessarily be utilitarian in its description.

the promotion of vegetarian diets and find that LL may justify the promotion of more humanely-produced animal foods.

1. THE CASE AGAINST THE LOGIC OF THE LARDER

1.1. *Do Farm Animals have Lives Worth Living?*

Under the population principle implied in LL, it is an advantage to raise an animal to be eaten only if that animal has, at a minimum, a life worth living.² Deciding what makes a life worth living is no simple matter. Yet we do employ such difficult reasoning, for example, when deciding whether to euthanize pets who are hopelessly sick. If we knew that, because of a dog's illness, he would have painful surgeries performed without anesthesia, be robbed of most of his natural behaviors, forced to live in his own excrement, and confined in a cage so restrictive that turning around or stretching his limbs was difficult, if not impossible, most of us would probably believe euthanizing him to be the humane choice.

In fact, there are many farmed animals in the United States who endure such conditions. Most US egg-laying hens are debeaked without anesthesia and kept in stacked cages, where they live at densities of 60 square inches per bird, cannot flap their wings, cannot carry out natural behaviors like nesting or dustbathing, and may be starved for 2 weeks to induce another laying cycle. Broiler "breeder" chickens have portions of their beaks and toes cut-off, and males also have their combs and leg spurs removed, all without anesthesia. They are bred with a predisposition for fast growth, lameness, and heart disease, and fed highly restrictive diets (Duncan, 2004). Most veal calves are kept in crates where they cannot turn around, and are made anemic to keep their meat pale in color. Last, most breeding sows are kept on concrete floors in gestation and farrowing crates, where they cannot turn around (Blackwell, 2004).

There is a large literature in the animal sciences on the welfare problems these conditions cause (see Benson and Rollin (2004), and Appleby et al., (2004) for references). And we suspect most people who visit the warehouses where these animals are kept would agree these animals have lives so chronically deprived of anything resembling a decent existence, their lives are not worth living. There is no way of proving it, of course, just as there is no way of proving that any animals (including humans) have lives filled with more or less misery than happiness. But we can still make reasonable guesses based on the conditions and mutilations these animals endure.

² Most utilitarians would say a life worth living must only have more happiness than suffering, or preference satisfaction than dissatisfaction. But some population principles are more demanding. See Blackorby et al. (1997).

Together, egg-laying hens, breeding birds and pigs, and veal calves account for 3% of the farm animals raised in the United States each year.³ Or, by a measure more consistent with the spirit of LL, these animals represent around 25% of farm animal life-years lived (Table 1).⁴

Other farm animals may have lives that are worthwhile. To us, it seems possible that dairy cows, non-breeding pigs, broiler chickens, and turkeys have lives worth living. However, if so, we think they would barely qualify. Most dairy cows spend their lives on barren dirt and concrete lots. They are repeatedly impregnated and are manipulated genetically and chemically to produce abnormally large quantities of milk. As a result, they suffer from chronic metabolic diseases, lameness, and udder infections (Garry, 2004). Pigs are castrated, have their tails cut-off and teeth removed, all without anesthesia. They live indoors on hard concrete floors, in their own excrement, with 10 square feet per animal (Blackwell, 2004). Broiler chickens have been bred to grow at grossly accelerated rates, causing a number of skeletal and cardiovascular problems. At the ends of their lives, they live at densities of around a square foot per bird, and 90% cannot walk properly, due to skeletal disorders. Turkeys live in the same conditions as broiler chickens, but may also be desnooded and have toes sliced off without anesthesia. Unlike cows and pigs, poultry are not required by federal law to be made unconscious before they are slaughtered (Duncan, 2004).

All of these animals have retained instincts from their wild ancestors to explore their environments and develop complex social structures (Keeling and Gonyou, 2001). But in intensive farms, many are confined in static environments, in unnatural group sizes, and exhibit signs of stress and frustration (Fraser and Weary, 2004). If these animals' lives are worth living, we suspect they are barely so. Together, these animals account for 96% of

³ In this paper, we do not include farmed fish as farm animals, as the precise number of these animals is impossible to determine from USDA data. There are, however, reasons to be concerned about the welfare of fish in aquaculture (Chandroo et al., 2004; Hatstein, 2004).

⁴ It is common to note the number of farm animals killed per year when discussing the ethics of animal agriculture. However, ethical questions relating to farm animal welfare depend on both the quality and duration of farm animals' lives. Different farm animals live for different lengths of time and it does not seem fair to suggest that confining an animal for a whole year before she is slaughtered is morally equivalent to confining an animal for 2 months before she is slaughtered. Borrowing a measure used in the health sciences, duration can be expressed in terms of "life-years," equal to the number of lives *times* the average lifespan in years. Assuming that every farm animal is "replaced" after slaughter with a new farm animal, the number of life-years per year is identical to the number of farm animals existing at any given moment. A life-year does not, in itself, include an estimate of welfare, which would require a subjective evaluation of the quality of life, per unit time. We do not speculate here, but perhaps a panel of animal welfare experts could estimate relative welfare weights, as has been done in the Quality-adjusted life-year (QALY) and Disability-adjusted life-year (DALY) models in health economics.

Table 1. Farm animal births and life-years, United States, 2003.

	Born per year (millions)	Percent of all born	Lifespan (years)	Life-years per year (millions)	Percent of all life years	Kg protein per life-year
Broiler chickens	8680	92.27	0.12	1042	60.44	1.85
Broiler breeders	46	0.49	1.3	61	3.54	—
Layer chickens	259	2.76	1.3	337	19.55	1.59
Turkeys	274	2.91	0.3	84	4.89	—
Hogs	101	1.07	0.6	59	3.42	16.4
Breeder sows	1	0.01	5.0	6	0.36	—
Beef cows	36	0.38	2.5	89	5.16	17.8
Dairy cows	9	0.10	5.0	45	2.61	234
Veal calves	1	0.01	0.27	0.3	0.02	—
Total	9407	100.00		1723	100.00	

Source: Estimated from USDA (2005). Protein per life-year calculated from CAST (1999) (Tables 4.8–4.13). Data were not found for turkey and veal.

the farm animals raised in the United States each year, and 69% of farm animal life-years lived (Table 1).

Cattle raised for beef are probably the least inhumanely treated of all farm animals in the United States. But they still suffer from routine husbandry practices. They may be dehorned and castrated without anesthesia. They spend much of their lives on barren feedlots. And they can be transported hundreds of miles without food or water. Slaughter is imprecise and some animals are dismembered while fully conscious (Eisnitz, 1997; Warrick, 2001). Still, we suspect most beef cattle have lives that are, on the whole, worth living. These cattle account for less than one percent of the farm animals raised in the United States each year, and 8% of farm animal life-years lived (Table 1).

The vast majority of farm animals have lives that seem to be not worth living or barely so. Even if we believe that only the first group of animals – battery hens, breeding birds, breeding sows, and veal calves – have lives not worth living, this has an important consequence for our dietary choices. In virtually all cases, one does not consume eggs without supporting the caging of battery hens, one does not consume pork without also supporting the crating of breeding sows, one does not consume chicken or turkey without also supporting the confinement of breeders, and one does not consume milk without also indirectly supporting veal crates. (Male dairy calves have no productive value but to be raised for veal, such that most dairy farms are

inextricably linked to the veal industry.) That is, by purchasing any animal product in the list besides beef, we are also supporting the worst abuses of egg-laying hens, breeding birds and sows, and veal calves. There are alternative production systems in which these animals are not intensively confined, but they represent at most 2% of the market and, in most cases, well under one percent (Rahn, 2002; and Personal correspondence).

C2, and LL with it, probably fail to support the consumption of most intensively-produced animal products. Arguably, however, it would not require dramatic improvements in farm conditions to give most of these animals lives worth living, satisfying C2. Many consumers have chosen to practice “conscientious omnivory” and consume only animals with lives they believe are worth living. The European Union is, on animal welfare grounds, phasing out many of the farming methods described above. And some European countries, such as Switzerland and Sweden, have made even more dramatic reforms. Such measures appear practical and even profitable, when the proper policies are in place. And we hope they will be imitated in North America, where farm animals now fare worse than anywhere else in the world.

But even if farm conditions were so improved that all farm animals had lives worth living, it may still be better if farm animals did not exist. Raising a farm animal requires the dedicated use of considerable amounts of land, some of which would be available – in the absence of that farm animal – to wild animals. Accordingly, raising farm animals may prevent a greater number of wild animals from existing.

1.2. Does Animal Agriculture Prevent a Greater Number of Animals with Lives Worth Living from Existing?

Above, we argued that the conditions in which many farm animals are raised likely involve such routine suffering, that they may not have lives worth living. Even if they did have lives worth living, however, LL faces another difficulty before it could justify purchasing meat, eggs, or dairy products.

Farm animal production requires large plots of agricultural land. Monogastric farm animals – pigs, turkeys, chickens – require a diet of feedgrains produced on cropland, and most cattle are “finished” on feedgrains in feedlots. Twenty percent of the United States’ land area is cropland, and around half of this area is used to grow animal feed. Another 32% of the United States’ land area is used for grazing cattle (Vesterby and Krupa, 2001).

This use of land has a significant impact on wildlife populations. Agricultural land is biologically simplified compared with many of the land-use

types it replaces, and a large fraction of its productivity is appropriated directly or indirectly by humans, greatly limiting that available to other animals. Likewise, the population densities of wild animals on agricultural land are typically lower than those on undisturbed land-use types.

An extensive review of wild bird densities estimated that the typical densities of wild breeding birds are: 300 individuals per square kilometer on cropland; 375 on pasture; 450 on grassland; 800 on temperate mixed forest; and 1250 on warm mixed forest (Gaston et al., 2003). A similar review has not been conducted for mammals. Based on a British study by Gaston and Evans (2004) and Harris et al. (1995), here we assume the densities of wild mammals are 2.25 times those of wild birds for each land-use type. Applied to other continents, this is probably a significant underestimate, as Peters (1983, p. 167) records densities for some *individual* North American mammal species of over 10,000 individuals per square kilometer.

Further, we assume that a decline in demand for cropland or pasture would cause conversion of cropland or pasture to a land-use type with wild bird and mammal densities equal to those of a warm mixed forest, or would prevent the clearing of such land for agricultural use. By these assumptions, a decrease of 1 km² in agricultural land results in an increase of around 3000 wild bird and mammal life-years (0.003 life-years per square meter).

Using these estimates, how do our diets affect the number of animals in existence? First, we must calculate the amount of cropland and pasture used by our diets. The recommended daily allowance of protein is 0.8 g per kg body weight for most adults. For the average American adult, this amounts to around 20 kg of protein per year. Most Americans consume about twice this recommended amount, with 63% of their protein coming from meats, eggs, and dairy; and 37% from grains, beans, and nuts (USDA ERS, 2005). For the purpose of our analysis, it is sufficient to look at the effects of consuming all (but only) 20 kg of protein from a single source.

If one obtained all of this protein from chicken meat, one would need to consume 82.6 chickens per year (CAST, 1999: Table 4.10). Given the 7-week lifespan of most chickens, this amounts to creating 10.8 chicken life-years (Table 1). To produce the animal feed for these chickens, one would need to use 280 m² of cropland (Smil, 2000: Table 5.2). Had this land been left uncultivated, 0.8 additional ($0.003 \times 280 \text{ m}^2$) wild bird or mammal life-years would have existed (Gaston et al., 2003). Subtracting this number from the 10.8 chicken life-years that exist thanks to our consumption of chicken meat (Table 1), the world has 10.0 *more* animal life-years than it would have, otherwise. Using the same method, we find that obtaining our protein from eggs causes an *increase* of 11.2 life-years; while obtaining our protein from pork, beef and dairy causes a *decrease* of 4.2, 13.6, and 1.3 life-years, respectively (Table 2).

Table 2. Farm and wild animal life-years gained and lost, by food type.

Food	Land use (m ²) per 20 kg protein	Farm animal life-years gained per 20 kg protein	Wild animal life-years lost per 20 kg protein	Net animal life-years per 20 kg protein
Chicken	280	10.8	0.84	+ 9.96
Eggs	440	12.5	1.32	+ 11.18
Pork	1800	1.22	5.4	−4.18
Beef	4900	1.12	14.7	−13.58
Milk	470	0.085	1.41	−1.325
Soybeans	200	0	0.6	−0.6

Source: Land use estimates for animal products based on median values from Smil (2000), Table 5.2; for soybeans, from United Soybean Board (2002). Farm animal life-years from CAST (1999), Tables 4.8–4.13. Wild animal life-years from differences between densities on cropland/pasture and warm mixed forest from Gaston et al. (2003), Gaston and Evans (2004), and assumptions noted in text (see p. 5).

If one became a strict vegetarian (vegan), the 20 kg protein would need to be derived solely from plant proteins. One kilogram of protein can be produced on as few as 10 m² planted with soy. So to produce 20 kg soy protein one would need 200 m² of cropland. Had this land been left uncultivated, an additional 0.6 wild birds and mammals would have existed. Thus obtaining 20 kg protein from soybeans would cause 0.6 fewer bird and mammal life-years to exist (Table 2).

These calculations suggest that a diet of poultry meat or eggs causes a net increase in the abundance of birds and mammals, relative to plant-based agriculture, on the order of 10 animal life-years per year, per 20 kg of protein. In contrast, a diet of pork, beef, or dairy causes a net decrease in the abundance of animal life-years. These results appear to support C5 with respect to chickens, but reject C5 with respect to cows and pigs.⁵

What are the implications of these results for a typical American omnivore? In a year, an American consumes, on average, 5.9 kg protein from beef, 4.4 from pork, 6.4 from poultry meat, 7.7 from milk, and 1.5 from eggs (USDA ERS, 2005; assuming 20% protein content in trimmed, boneless meats, by edible weight). Applying the numbers in Table 2, an American omnivore's meat, egg, and milk purchases are responsible, for, on

⁵ For simplicity, we have assumed here that a life-year for a wild animal and a life-year for a farm animal have equal moral value. No doubt arguments could be made to favor either set of animals. Other arguments have been made that neither set of animals has lives worth living – their lives are filled with more misery than happiness (Ng, 1995). In this case, it would be best to adopt a diet that results in the fewest number of animal life-years.

average, the net loss of 1.4 animal life-years per year. For a vegetarian to obtain the same protein (25.9 kg) from soybeans requires a net loss of only 0.8 animal life-years per year. Thus, a vegan vegetarian diet may result in fewer animal life-years than a diet of chicken meat and eggs, but more animal life-years than a typical American diet.

Several caveats should be made about these calculations. The first set of caveats regards assumptions that may overestimate our case against LL. First, not all unused agricultural land is likely to become uncultivated wild habitat. Distortionary farm support and farmland preservation programs reduce land conversion that could, in theory, result from decreasing demand for animal products. Moreover, it is not clear that unused agricultural land has a higher probability of becoming a wild land-use type than of becoming a housing or commercial development. Second, even if agricultural land were converted to wild habitat, it may not sustain population densities as high as those of a warm mixed forest.

The second set of caveats regards omissions that underestimate the case against LL. First, we have ignored externalities of agriculture that indirectly affect wild animal populations, such as air, soil, and water pollution, greenhouse gas emissions, and habitat fragmentation (as separate from habitat loss) – as well as externalities of other activities necessary for agricultural production, such as transportation and road construction. These externalities can be significant, especially for animal farming (de Haan et al., 1997).

Second, increasingly, meat and feedgrains are produced in tropical regions. This production strengthens the case against LL in three ways. Increased demand for animal products causes previously wild habitat in these regions to be converted into new agricultural land, so the question of conversion back to wild land-use types doesn't arise (Kaimowitz et al., 2004).⁶ Tropical regions sustain wildlife densities much higher than those we have assumed (Reagan and Waide, 1996, p. 510; Gaston et al., 2003). And new agricultural land in these regions is generally not as productive as existing land, so land requirements per kg protein would be higher than those we have assumed.

Third, we have ignored the abundance of animals in other taxa. Data could not be found, and widening the scope would raise thornier questions about where, in the animal kingdom, moral standing begins (Chan, 2004).

⁶ It might be objected that most animal products purchased in the United States are produced domestically, and thus agricultural production in tropical regions can be ignored. This objection fails in an efficient global commodities market. The increasing consumption of animal products, wherever it is produced, serves to draw existing cropland to its production limits and increase demand for new cropland. Likewise, we consider it likely that reductions in the consumption of US animal products slow the clearing of tropical habitat for feedgrain production, depending on the existing amount of fallow cropland, and the efficiency of the commodities market.

There is increasing evidence that fish, reptiles, and possibly amphibians are sentient (Rose and Adams, 1989; Cabanac, 1999; Chandroo et al., 2004). The number of these animals affected by animal agriculture is substantial. For instance, in 1991, an estimated one billion fish were killed from farm animal manure run-off in North Carolina, alone (Zakin, 1999). And population densities of reptiles and amphibians in some tropical regions are 1000 times those of mammals and birds (Reagan and Waide, 1996, p. 510).

Weighing the two sets of caveats, we have probably understated the case against LL. For poultry meat and egg consumption to cause a net decrease in animal life-years would require that wildlife densities be 10 times the value we assumed. This could easily be the case if demand for feedgrains is associated with clearance of tropical habitat, where wildlife densities are up to 1000 times the value we assumed.

1.3. Are Chicken Meat and Egg Purchases Cost-Effective Means of Producing Moral Value?

Contrary to our expectations, C5 of LL may hold, though only for poultry, and only if we disregard the clearance of tropical habitat. This conclusion is not relevant to most chicken meat and egg purchases, as we argued above that the vast majority of farmed chickens are intensively confined and have lives of dubious value. However, if chickens were made to have lives of reasonable worth, then as long as they had lives that were perhaps 10% as pleasant or valuable as the lives of wild animals, then chicken meat and egg purchases could increase the net amount of moral value in the world.

We are left with the last condition of LL, C6: if chickens were made to have lives worth living, would purchases of chicken meat or eggs be more cost-effective in producing moral value than any alternative use of our money? Singer (1972) and Unger (1996) advance arguments, under a variety of ethical theories, that we are morally obliged to make the most efficient use of our money (and other resources) in producing moral value. We accept their arguments and assume the proponent of LL would have to, as well. Here, we compare the cost-effectiveness of chicken, egg, and vegetable protein purchases in producing animal life-years.

Assuming a cost of \$3 per pound of boneless chicken and \$1.40 per dozen eggs, chicken meat and eggs cost around \$27 and \$38 per kg protein (or \$54 and \$68 per life-year), respectively. In contrast, dry beans and texturized vegetable protein (TVP) cost around \$6 and \$7 per kg protein, respectively. Eating beans or TVP, rather than chicken meat or eggs, would thus free \$20–\$32 per kg protein that we could spend to increase moral value. Could this money be spent in such a way to increase moral value by a greater amount than purchases of meat or eggs?

There are many animals smaller than farm animals, who require smaller investments to house and feed. For instance, an adult mouse weighs around 30 g, while a chicken is around 67 times heavier, at 2 kg. Assuming the marginal costs of housing and feeding animals are roughly proportional to their weight, one could tend a colony of 67 mice for the same cost as tending a single chicken – less than a dollar per life-year. Thus, by eating beans rather than chicken, and investing our saved money in raising colonies of mice, we could create on the order of 50 times as many life-years per dollar invested.

No doubt, there are projects besides mouse colonies that are also more cost-effective than chicken meat or egg purchases in accruing moral value – donations to some charities, for instance. This conclusion, and perhaps this entire line of inquiry, will strike many readers as absurd. We do not suggest that it is otherwise. But it is the logical result of accepting LL's premises, and proponents of LL should likewise be prepared to become mouse farmers.

2. THE LOGIC OF THE LARDER AND THE PROMOTION OF VEGETARIAN DIETS

The Logic of the Larder's argument for personal omnivory fails. If one wishes to increase the total population of happy animals in the world, one should likely adopt a (vegan) vegetarian diet and invest savings in colonies of mice, or other projects. Since this prescription for personal action is unlikely to be followed, however, there remains one important implication of LL. Although there are alternatives to buying chicken meat and eggs that are more cost-effective in increasing the number of happy animals, these alternatives are unlikely to be adopted. Even among those who would adopt a vegetarian diet, few would spend their saved income on mice colonies or similar projects.

It may be, then, that promotion of conscientious omnivory (albeit, only of poultry meat and eggs) increases the number of happy animals more than any likely alternative. If so, LL may require us (perhaps secretly) to adopt a strict vegetarian diet, while we may be obliged, at the same time, to promote the substitution of humanely-raised poultry meat and eggs for beef and pork. This is not to say that the promotion of vegetarianism is counterproductive. On the contrary, the numbers here suggest that the promotion of vegetarianism among typical omnivores results in a net increase in the number of animal life-years. However, the promotion of humanely-produced poultry and eggs may be even more effective, depending on whether vegetarians are likely to donate saved money to more cost-effective projects.

This conclusion is of greatest relevance to the animal protection movement, which may make a greater contribution to animal welfare by

promoting improvements in farm animals' lives – especially those of poultry – than by promoting vegetarianism.

There are a number of economic matters that complicate the optimal strategy, in the short-term, for improving farm animal welfare. The promotion of vegetarianism may encourage producers to adopt more humane practices for fear of losing customers. Especially if vegetarianism is promoted as a coordinated boycott of particular farming practices, it would be expected to lead to the same kinds of animal welfare changes as those brought by regulation (Cowen, 2005). As a practical matter, the promotion of “vegetarianism” is more straightforward than the promotion of “substitution of humanely-raised poultry for pork and beef.” The promotion of vegetarianism may have other, less direct benefits. For instance, it may deliver a symbolic message to the public about the need for a new ethic towards animals; and it may make conscientious omnivory more of a mainstream position (Singer, 1999).

At the same time, consumers can choose to become vegetarian for a number of health, economic, and ethical reasons. Abstaining from meat, egg, or milk purchases may thus deliver an ambiguous signal to producers. On this score, conscientious omnivores may have more influence over husbandry practices, as the motivation for such purchases is clearly linked to consumers' regard for animal welfare. And as a practical matter, more consumers may be willing to become conscientious omnivores than are willing to become vegetarians.

The opportunities for gains from conscientious omnivory are great, as North America lags behind most of the world in regard to farm animal welfare. As an immediate matter, the United States and Canada would do well to adopt the farm animal welfare policies accepted by the European Union. They are modest, but a place from which to begin. Consumers would, in turn, accelerate improvements in farm animal welfare by supporting producers and retailers that sell products from more humanely-raised animals. The US grocery chain Whole Foods, for instance, has begun developing farm animal welfare standards that exceed those of any country.

3. CONCLUSIONS

The Logic of the Larder fails. Many farm animals have lives that are not worth living, while others cause a net decrease in the number of animals in the world. Even if this were not so, the purchase of animal products uses resources that could otherwise be used to bring a much greater number of animals into existence. If we want to maximize the number of animals with

lives worth living, we should adopt a vegetarian diet.⁷ There may still be good practical reasons for promoting conscientious omnivory while, at the same time, practicing personal vegetarianism. These reasons depend, in large part, on how we weigh the moral value of adding happiness to the world against the moral value of preventing suffering.

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⁷ We have not discussed hunting. However, two points about hunting are worth mentioning. First, it seems likely that obtaining one's meat by hunting or fishing is preferable to obtaining one's meat by intensively farming animals. Second, it also seems likely that, although a hunter kills a number of animals and disturbs wild habitat, depending on the size of the animals he hunts, he may allow more wild animals to exist than a vegetarian who buys foods intensively-grown on cropland. Kerasote (1994) has justified subsistence hunting of large mammals on these grounds. However, this line of reasoning succeeds only as an indictment against industrial agriculture, and not as an indictment against vegetarianism. A vegetarian could, by gardening or gathering, also adopt a subsistence diet. In doing so, he may reduce his impact on wildlife to that of or below the hunter's. The time needed to devote to any subsistence diet – whether plant- or meat-based – would likely interfere with other pursuits of moral significance. And it seems unlikely that such a diet would be possible for large populations.

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