DID THE CHICKEN CROSS STATE LINES? DISCUSSING THE CONSTITUTIONAL IMPLICATIONS OF IMPLEMENTING A SALES BAN ON INHUMANE POULTRY PRODUCTS IN OHIO

Ginger: So laying eggs all your life and then getting plucked, stuffed, and roasted is good enough for you, is it?

Babs: It's a livin'.1

INTRODUCTION	632
I. THE MODERN CHICKEN INDUSTRY: ANIMAL SUFFERING	
AND SENTIENCE	634
A. The Evolution of America's Favorite White Meat	634
B. Evidence of Chicken Sentience	636
C. How Do You Measure Animal Suffering?	637
II. A PROPOSED LEGISLATIVE AMENDMENT	639
A. Ohio's Existing Legislation	639
B. Proposal to Change Ohio's Existing Regulations	642
C. California's Proposition Two and Other State Legislation	
D. Implementing a Sales Ban in Ohio	
III. DOES A SALES BAN ON CHICKEN PRODUCTS VIOLATE THE	
DORMANT COMMERCE CLAUSE?	649
A. The Commerce Clause	650
B. Tenth Amendment Limitations to the Commerce Clause	651
C. The Dormant Commerce Clause	652
1. Hughes v. Oklahoma: Facially Discriminatory Analysis	652
2. Hunt v. Washington State Apple Advertising Commission:	
Discriminatory-in-effect Analysis	654
3. Pike v. Bruce Church, Inc.: Even-handed Balancing	
Approach	656
D. Ohio's Balancing Test	
1. Ohio's Public Health Concerns	
2. Ohio's Environmental Concerns	659
CONCLUSION	661

INTRODUCTION

The chicken industry kills 9 billion broiler chickens in the United States each year.² Distinguished from egg-laying hens, broiler chickens are birds raised only for their meat.³ Modern broiler-chicken production crowds tens of thousands of birds into 350-foot buildings where each animal only has about a half a square foot of floor space each.⁴ As a result, "[h]ysteria (mass panic), cannibalism, and heart attacks" are common occurrences.⁵ Due to overcrowding, the chickens are unable to move naturally or perch, which leads to broken limbs and wings, as well as ammonia burns from lying in contaminated litter for many hours throughout the day.⁶ With little to no federal protection, chickens receive the worst treatment compared to any other farm animal in the United States.⁷ This Note addresses potential changes at the state level that could improve poultry welfare.

Many states have implemented animal-confinement restrictions.⁸ Michigan and Ohio, for example, have passed laws that ban the use of gestation and veal crates, as well as battery cages for egg-laying hens.⁹ California ¹⁰ and Massachusetts ¹¹ have taken steps even further by prohibiting the sale of caged eggs within their borders. In 2014, California's regulations came under judicial review, but the court never reached the

- 5. *Id*.
- 6. *Id*.

^{2.} Chickens Used for Food, PETA, http://www.peta.org/issues/animals-used-for-food/factory-farming/chickens/ (last visited Apr. 17, 2018).

^{3.} COMPASSION IN WORLD FARMING, THE LIFE OF: BROILER CHICKENS 1 (2013), [hereinafter CIWF], https://www.ciwf.org.uk/media/5235306/The-life-of-Broiler-chickens.pdf.

^{4.} MICHAEL W. FOX, INHUMANE SOCIETY: THE AMERICAN WAY OF EXPLOITING ANIMALS 31 (1990).

^{7.} Farmed Animals and the Law, ANIMAL LEGAL DEF. FUND, [hereinafter ALDF], http://aldf. org/resources/advocating-for-animals/farmed-animals-and-the-law (last visited Apr. 17, 2018).

^{8.} See Farm Animal Confinement Bans by State, AM. SOC'Y FOR PREVENTION CRUELTY TO ANIMALS, http://www.aspca.org/animal-protection/public-policy/farm-animal-confinement-bans (last visited Apr. 17, 2018) (listing confinement practices by state).

^{9.} MICH. COMP. LAWS § 287.746 (2010); see also A Milestone for Ohio Farm Animals: Ohio Livestock Care Standards Board Finalizes Welfare Standards, HUMANE SOC'Y U.S. (Apr. 20, 2011), http://www.humanesociety.org/news/press_releases/2011/04/ohio_livestock_board_042011.html (describing the enactment of care standards for farm animals in Ohio).

^{10.} CAL. HEALTH & SAFETY CODE § 25996 (2014).

^{11.} See Massachusetts Minimum Size Requirements for Farm Animal Containment Question, 3 (2016), BALLOTPEDIA, [hereinafter Question 3], https://ballotpedia.org/Massachusetts_Minimum_Size_Requirements_for_Farm_Animal_Containment,_Question_3_(2016) (last visited Apr. 17, 2018) (discussing the results of a ballot measure in Massachusetts to bar the sale of meat and eggs from certain farm animals in confined spaces).

issue of whether the law violated the Dormant Commerce Clause.¹² Therefore, under current precedent, the constitutional argument that sales bans are permissible remains open for interpretation.

While improving confinement practices has made large strides in recent years, not much has been done to enhance the welfare practices for broiler chickens. Accordingly, this Note will address the possibility of expanding confinement restrictions to encompass broiler chickens. Specifically, this Note will focus on Ohio's chicken industry because the State already has livestock-welfare legislation in place. In 2009, Ohio passed a constitutional amendment to create the Ohio Livestock Care Standards Board (Board). This Board promulgated regulations that require the phasing out of gestation and veal crates, as well as battery cages. In Importantly, Ohio's definition of "livestock" includes poultry. Therefore, as the sixteenth largest producer of broilers in the nation, Ohio provides a great opportunity for improving chicken welfare.

Part I of this Note will discuss current industry standards and explore the moral and ethical consequences of mainstream poultry production. Next, Part II will introduce my recommended language for expanding Ohio's current livestock laws. My proposed rules will improve upon Ohio's current legislation by recommending reduced stocking density requirements. In other words, the new instructions will advise producers to raise fewer birds per square foot. Most importantly, this proposal will include a sales ban on poultry products produced in a manner that is outside the scope of the statutory language.

After introducing and explaining my proposed expansion of Ohio's current laws concerning poultry products, Part III of this Note will address the constitutional implications of a sales ban. This part will explain how the recommended ban applies evenhandedly and will not violate constitutional law. Namely, Ohio will be able to demonstrate that the rules satisfy the *Pike* test because the local benefit outweighs the burden on interstate

^{12.} See Missouri v. Harris, 58 F. Supp. 3d 1059, 1079 (E.D. Cal. 2014) (dismissing for lack of standing), aff'd, 847 F.3d 646 (9th Cir. 2017).

^{13.} See Veronica Hirsch, Overview of the Legal Protections of the Domestic Chicken in the United States and Europe, MICH. ST. U. (2003), https://www.animallaw.info/article/overview-legal-protections-domestic-chicken-united-states-and-europe (explaining that chickens receive little to no state or federal protection); see also CIWF, supra note 3, at 1–3 (describing the life of a broiler chicken).

^{14.} Lindsay Vick, Comment, Confined to a Process: The Preemptive Strike of Livestock Care Standards Boards in Farm Animal Welfare Regulation, 18 ANIMAL L. 151, 154 (2011).

^{15.} *Id*.

^{16.} Id. at 163-64.

^{17.} OHIO REV. CODE ANN. § 934.01(A) (2012).

^{18.} Ohio's Egg, Chicken and Turkey Farms: Economic Impact on the State, OHIO POULTRY ASS'N, http://www.ohpoultry.org/fastfacts/docs/generalFactSheet.pdf (last visited Apr. 17, 2018).

commerce.¹⁹ Ultimately, Ohio has legitimate interests in addressing the public health and environmental concerns by regulating the stocking requirements of its broiler chickens. Therefore, the proposal that this Note sets forth is both necessary for poultry welfare and constitutional.

I. THE MODERN CHICKEN INDUSTRY: ANIMAL SUFFERING AND SENTIENCE

A. The Evolution of America's Favorite White Meat

Historically, meat was a luxury.²⁰ However, in the late 1800s, new technology—such as railroads and effective refrigeration—allowed meat to reach the plates of many American households.²¹ In these early days, farmers primarily produced livestock on small family-operated farms.²² Accordingly, growing meat was a labor-intensive and costly business.²³ Throughout the 1900s, in response to the sporadic nature of the industry, chicken producers industrialized and consolidated their productions.²⁴ As a result, the modern chicken industry shares little in common with its pastoralist roots.²⁵

As industrial agriculture developed in the United States, vertical integration had the largest effect on the chicken industry.²⁶ Vertical integration occurs when a processor owns every part of the supply chain.²⁷ For example, Tyson owns its chickens throughout each step of the production process—from the breeders, hatcheries, feed mills, and

^{19.} See Pike v. Bruce Church, Inc., 397 U.S. 137, 142 (1970) (clarifying that states may pass legislation as long as the passed legislation does not create an excessive burden in comparison to local benefits).

^{20.} See Dan Charles, The Making of Meat-Eating America, NAT'L PUB. RADIO (June 26, 2012, 3:03 AM), http://www.npr.org/sections/thesalt/2012/06/26/155720538/the-making-of-meat-eating-america (stating that, in the 1800s, wealthy, European aristocrats who owned land were the primary meat consumers).

^{21.} See id. (discussing the impact of technology on the meat industry).

^{22.} See CHRISTOPHER LEONARD, THE MEAT RACKET 49 (2014) ("For more than a hundred and fifty years before the Depression, the family farm was the basic economic and social building block of the country.").

^{23.} See id. at 52-53 (detailing difficulties in chicken farming).

^{24.} See Charles, supra note 20 (explaining how entrepreneurs reduced prices, which in turn popularized chicken for consumption); see also LEONARD, supra note 22, at 62 (describing Tyson's integration of the production process: the family owned the production process from breeding to slaughterhouse).

^{25.} See LEONARD, supra note 22, at 47, 59–62 (describing how John Tyson and his son transformed the traditional family farm to a multimillion-dollar industry).

^{26.} See Tomislav Vukina, Vertical Integration and Contracting in the U.S. Poultry Sector, 2001 J. FOOD DISTRIBUTION RES. 29, 29 (discussing the prevalent pattern of vertical integration in the poultry industry).

^{27.} See id. at 37 (explaining the mechanics of vertical integration).

slaughterhouses.²⁸ A vertically integrated company relies on contracts to manage supplies.²⁹ Today, nearly the entire broiler industry relies on this business model.³⁰

Tyson and other producers transitioned to a vertically integrated supply chain in response to the volatile nature of raising animals for profit.³¹ Because chickens are living creatures, production is constantly changing and uncertain.³² The sad truth of poultry farming is that some flocks are more successful than others.³³ By shifting the risk to contract farmers, producers—like Tyson—are able to increase their economic gains.³⁴ Therefore, the drive to expand or expire has led the chicken industry to grow exponentially, virtually turning the animals into machines.³⁵

As the industry became smaller through integration, the growing operations conversely grew in size.³⁶ The dominant paradigm that drives the current chicken industry is: "What is the least amount of floor space necessary per bird to produce the greatest return on investment?"³⁷ This question has influenced the majority of broiler chicken operations to allocate only 0.7 to 0.8 square feet per chicken.³⁸ Because of this space allotment, producers cram nearly 20,000 to 40,000 birds into dark, windowless buildings—deep-litter houses.³⁹ While technically broiler chickens are "cage-free," the amount of space apportioned to each bird is comparable to egg-laying hens kept in battery cages.⁴⁰ However, unlike cages that provide caretakers easy access to deliver food and veterinary

- 28. LEONARD, supra note 22, at 62.
- 29. See Vukina, supra note 26, at 29, 32–33 (discussing the "widespread adoption of production contracts" in vertical integration).
 - 30. See id. at 29 (depicting the popular use of production contracts in the poultry industry).
- 31. See id. at 32 ("Anticipation of a volatile and uncertain future, which characterizes broiler production, should lead to vertically integrated production").
 - 32. *Id*
- 33. *See, e.g.*, LEONARD, *supra* note 22, at 17–18, 32, 36 (relaying the unfortunate story of a Tyson-contract farmer named Jerry Yandell who lost his farm because his flocks kept dying).
 - 34. Vukina, *supra* note 26, at 32–33.
- 35. See LEONARD, supra note 22, at 67–70, 76, 81–82, 86 (tracing the immense expansion of Tyson Foods, Inc. from its family roots to the industry giant it is today).
- 36. *Cf.* ROBERT GARNER, ANIMALS, POLITICS AND MORALITY 96 (1993) (comparing the size of the broiler industry in Britain and the United States, respectively); *see also* FOX, *supra* note 4, at 31 (noting that broiler factories grew in footage and contained tens of thousands of birds).
- 37. Joan Dunayer, *Sexist Words, Speciesist Roots, in* Animals and Women: Feminist Theoretical Explorations 11, 24 n.5 (Carol J. Adams & Josephine Donovan eds., 1995) (quoting Donald D. Bell & Mack O. North, Commercial Chicken Production Manual 458 (4th ed. 1990)).
 - 38. Id.
- 39. See FOX, supra note 4, at 31 (explaining that broiler factories are typically buildings, up to 350-feet long, filled with "deep litter" made of wood shavings or some other absorbent materials).
 - 40. Id. at 30-31.

care, broiler chickens live in stockpiled conditions, which makes access to the animals nearly impossible for producers.⁴¹ The predominance of producing chicken in dark, overcrowded longhouses has led to a multitude of welfare issues that put both the animals and quality of meat in jeopardy.⁴²

B. Evidence of Chicken Sentience

Based on a lack of understanding concerning animal sentience, the meat industry has often equated poultry birds and other avian species with an absence of awareness. In fact, people often use the term "bird brained" to describe individuals who lack intelligence. ⁴³ This derogatory phrase demonstrates that humans typically do not consider birds, such as chickens, as intelligent creatures. However, recent studies have shown that chickens possess higher levels of consciousness than previously recognized. ⁴⁴ In fact, scientists have found that poultry birds are capable of abstract thought, basic emotions, decision-making, communication, and developing relationships. ⁴⁵

Chickens begin to interpret information very early in their lifespan.⁴⁶ Soon after emerging from their shell, chicks explore their surroundings by pecking.⁴⁷ The young offspring also possess the ability to recognize and interact with their families.⁴⁸ In fact, as chickens grow up, this ability extends into facial recognition, and the birds can develop interspecies relationships.⁴⁹ Astonishingly, studies have shown that chickens have the capacity to remember, distinguish episodic memories, and formulate

^{41.} Id. at 31.

^{42.} See A.L. Hall, The Effect of Stocking Density on the Welfare and Behaviour of Broiler Chickens Reared Commercially, 10 ANIMAL WELFARE 23, 30–37 (2001) (discussing the negative welfare implications attributed to higher stocking densities).

^{43.} See Lori Marino, Thinking Chickens: A Review of Cognition, Emotion, and Behavior in the Domestic Chicken, 20 ANIMAL COGNITION 127, 127–28 (2017) (discussing human perceptions toward chicken intelligence).

^{44.} See id. at 130-41 (enumerating the vast cognitive abilities that chickens possess).

^{45.} See Carolynn "K-lynn" L. Smith & Sarah L. Zielinski, Brainy Bird, 310 Sci. Am., 60, 62 (2014) (describing insights into the brains of chickens).

^{46.} See id. at 65 (referencing a study showing that young chicks have the ability to distinguish between numbers and use geometry).

^{47.} See Jacquie Jacob, Normal Behaviors of Chickens in Small and Backyard Poultry Flocks, EXTENSION (May 5, 2015), http://articles.extension.org/pages/66175/normal-behaviors-of-chickens-in-small-and-backyard-poultry-flocks (describing chicks' pecking behavior).

^{48.} See Marino, supra note 43, at 137 (portraying the social cognition and recognition abilities of chickens).

^{49.} Cf. id. (illustrating that chickens recognize details).

responses to their environment.⁵⁰ Most importantly, chickens have the ability to develop both positive and negative emotions.⁵¹ These studies demonstrate that chickens are more aware of their surroundings than producers have been led to believe. Therefore, the incredibly complex nature of chickens suggests that the birds deserve moral consideration.

Chickens are also highly social creatures.⁵² In fact, as early as the 1920s, biologists observed evidence of complex interactions amongst poultry populations.⁵³ The animals possess twenty-four distinct vocalizations, which they use to communicate with and warn each other of danger.⁵⁴ According to scientists, chickens are functionally referential—meaning "they refer to specific objects and events broadly in the way that words used by people do."⁵⁵

Further, chickens show complex psychological flexibility allowing them to navigate through a dynamic network of social relationships. ⁵⁶ Chickens can distinguish and keep track of relationships within their social hierarchies, creating incredibly strong bonds amongst the flock. ⁵⁷ The complexity of the social dynamics within poultry populations suggests that chickens suffer severe social deprivation when crammed into broiler houses. Consequently, the birds must have more space to realize their social potential.

C. How Do You Measure Animal Suffering?

At the minimum, animal welfare is a combination of a wide variety of needs that make life possible—such as food, water, and exercise.⁵⁸ Beyond these physiological needs, a motivational state also drives animal behavior.⁵⁹ This state leads the animals to engage in physiological or behavioral responses that help realize certain biological needs.⁶⁰ For example, chickens that are overheating or thirsty will naturally desire to

^{50.} Id. at 133, 136.

^{51.} See id. at 139-41 (finding that chickens can experience fear, anticipation, cognitive bias, empathy, and personality).

^{52.} Id. at 137-39.

^{53.} See Smith & Zielinski, supra note 45, at 62 (discussing the discovery of a dominance structure named the "pecking order").

^{54.} Id.

^{55.} Id. at 63.

^{56.} Marino, *supra* note 43, at 137.

^{7.} Id.

^{58.} D. M. Broom, *Animal Welfare: Concepts and Measurement*, 69 J. ANIMAL SCI. 4167, 4167 (1991).

^{59.} Id.

^{60.} Id.

retreat to a cooler area and get a drink of water. 61 However, in cramped conditions—such as a broiler chicken house—the heat stress and deprivation of motivational states will be acute. 62 According to one animal researcher, "suffering occurs when unpleasant subjective feelings are acute or continue for a long time because an animal is unable to carry out the actions that would normally reduce risks to life and reproduction in those circumstances." However, what constitutes unnecessary suffering goes beyond what scientific evidence alone can determine. 64 Consequently, animal suffering is also a political question determined by public opinion, which influences federal and state legislation. 65

To determine whether an animal experiences distress, many scientists use behavior as a means of quantifying pain and suffering in nonhuman animals. ⁶⁶ Besides the inability to escape from a lifetime of pain, behavioral suppression is another factor in poor welfare conditions. ⁶⁷ Looking at chickens, behavioral changes that result from industrial agriculture include: frequently lying down, reduced food intake, and gait changes. ⁶⁸ These behaviors demonstrate that the animals experience pain. ⁶⁹ Many scientists also observe disease and injury as additional indicators of animal suffering. ⁷⁰ Because current standards for poultry production repress behavior and cause immeasurable harm, the chickens suffer from high levels of distress, ⁷¹ which local laws could relieve exponentially. ⁷²

The meat industry's prevailing paradigm is: production equals profit.⁷³ However, many manufacturers also link this philosophy to animal wellbeing.⁷⁴ In other words, those with a lack of understanding of animal behavior equate productivity with the belief that the creature does not

^{61.} See id. (explaining how animals respond to various needs).

^{62.} Id. at 4168–69.

^{63.} *Id.* at 4168 (explaining the results of a 1990 study performed by animal biologist Richard Dawkins).

^{64.} Robert Garner, *Animal Welfare: A Political Defense*, 1 J. ANIMAL L. & ETHICS 161, 163 (2006).

^{65.} *Id*.

^{66.} See Jacky Turner et al., CIWF Trust, The Welfare of Broiler Chickens in the European Union 1–3 (2005) (summarizing the harmful practices within the modern poultry industry).

^{67.} Id. at 2.

^{68.} *Id*.

^{69.} Id.

^{70.} Broom, *supra* note 58, at 4169.

^{71.} *Id*.

^{72.} See infra Part II (discussing the benefits of state livestock welfare laws).

^{73.} See GARNER, supra note 36, at 104 ("Productivity refers to the profit that can be made from animals").

^{74.} See id. (clarifying the lack of relationship between productivity and animal welfare).

suffer.⁷⁵ Unfortunately, this theory does not reflect reality.⁷⁶ For example, fast weight gain—seen as a productive trait in broiler chickens—compromises the health and welfare of the animal.⁷⁷ As such, the rapid growth causes immense suffering.⁷⁸ Therefore, laws should be set in place to prevent producers from causing undue harm to chickens.

According to prominent animal philosopher Bernard E. Rollin, animals have *telos*, which is the "essence and purpose of a creature "⁷⁹ In other words, a chicken's *telos* is the ability to express its "chicken-ness."⁸⁰ By confining broiler chickens in cramped houses without access to light or exercise, the animals experience suffering because they are unable to act on this *telos* behavior. ⁸¹ Depriving the animals of the ability to act on their natural instincts diminishes the overall welfare of the creatures. ⁸² Observational studies show that, due to the limited space in the longhouses, chickens that lack control over their environment engage in stereotypic behavior. ⁸³ Stereotypic behavior occurs when animals are unable to express their natural instincts. ⁸⁴ Such behaviors include pacing and aggressive pecking at the other flock members. ⁸⁵ Thus, studies show that industry standards—which suppress natural behavioral expression—severely degrade chicken welfare and cause long-term suffering. ⁸⁶

II. A PROPOSED LEGISLATIVE AMENDMENT

A. Ohio's Existing Legislation

Ohio is in the top sixteen states for poultry production.⁸⁷ In fact, on average, the State produces up to 376,800 pounds of chicken per year.⁸⁸ In

^{75.} See id. (distinguishing suffering from productivity).

^{76.} See id. (stating that using productivity as a measurement for welfare is fundamentally flawed).

^{77.} Id.

^{78.} See id. at 96, 102, 104 (providing evidence of animal suffering due to modern production nethods).

^{79.} Bernard E. Rollin, *On Telos and Genetic Engineering*, in The Animal Ethics Reader 407, 407 (Susan J. Armstrong & Richard G. Boltzer eds., 2d ed. 2008).

^{80.} See id. (applying "robin-ness" telos to chickens).

^{81.} See id. (applying Aristotle's theory of animal telos to chickens' behavioral possibilities).

^{82.} See id. (applying the telos theory to the chickens' welfare).

^{83.} Broom, *supra* note 58, at 4170.

^{84.} Id.

^{85.} Id

^{86.} See id. (finding that a lack of control causes severe welfare concerns); see also Rollin, supra note 79, at 411 (arguing that current farm practices "patently violate" the chickens' telos and cause the animals to suffer while technology keeps them alive).

^{87.} OHIO POULTRY ASS'N, supra note 18.

addition, Ohio is one of the only broiler-producing states with legislation already in place to protect farm animals from inhumane treatment. ⁸⁹ Therefore, Ohio provides many opportunities for advancing broiler chicken welfare.

In 2009, Ohio passed Issue 2, which was a constitutional amendment that created the Ohio Livestock Standards Board (Board). The creation of the Board was arguably a preemptive strike by industry leaders. Responsively, agribusiness advocates proposed the amendment to prevent animal welfare organizations from imposing stricter regulations on livestock and poultry production in Ohio. However, the amendment provides a viable avenue for affecting regulatory change. The purpose of the Board is to consider "agricultural best management practices for . . . care and well-being, biosecurity, disease prevention, animal morbidity and mortality data, food safety practices, and the protection of local, affordable food supplies for consumers." Accordingly, the Board has the power to "establish standards governing the care and well-being of livestock and poultry" in the state "95

In 2011, despite staunch industry resistance, the Board entered into an agreement with the Humane Society of the United States (Humane Society) to phase out the use of confining veal crates by December 31, 2017. Importantly, the Board entered into this deal after receiving nearly 4,700 public comments in support of the initiative. These responsive actions demonstrate that livestock welfare is a primary concern for Ohio's residents. Because the Board maintains discretionary authority throughout its rulemaking process, the Board can respond to public demand by passing

^{88.} *Top Broiler Producing States*, NAT'L CHICKEN COUNCIL, http://www.nationalchickencouncil.org/about-the-industry/statistics/top-broiler-producing-states/ (last visited Apr. 17, 2018).

^{89.} See Elizabeth R. Rumley, States' Farm Animals Confinement Statutes, NAT'L AGRIC. L. CTR., http://nationalaglawcenter.org/state-compilations/farm-animal-welfare/ (last visited Apr. 17, 2018) (providing a map of animal confinement statutes by state); see also OHIO CONST. art. XIV, § 1 (describing livestock-care standards governing the care and wellbeing of broiler chickens).

^{90.} Vick, supra note 14, at 154.

^{91.} See id. at 154-55 (stating that industry leaders who view animal activists as threats to agriculture proposed Issue 2).

^{92.} Id.

^{93.} Id. at 158.

^{94.} OHIO CONST. art. XIV, § 1(B).

^{95.} Vick, supra note 14, at 154 (quoting OHIO CONST. art. XIV, § 1).

^{96.} Id. at 158.

^{97.} Id.

welfare legislation.⁹⁸ Therefore, expanding the confinement restrictions to broiler chickens has a logical nexus within Ohio's existing state laws.

Since its genesis, the Board has passed many regulations concerning animal welfare within the state.⁹⁹ Particularly, concerning poultry broilers and breeders, the rules mandate certain management practices.¹⁰⁰ Of specific importance for this Note are the current housing requirements for livestock in Ohio. According to the regulations, livestock housing must meet the following conditions:

- (1) Must provide a clean and safe environment that promotes the health, welfare and performance of broilers/broiler breeders at all stages of their lives;
- (2) Bedding, if provided, must be of a good quality and absorbent;
- (3) Environmental moisture must be managed, whether birds are housed indoors or outdoors, to promote flock health and welfare;
- (4) Stocking densities must allow all broilers to rest at the same time without being forced to rest on top of each other at all stages of production and, in addition, all broilers must be able to access feed and water without excessive competition that prevents individuals in the flock from maintaining normal body condition ¹⁰¹

The rules also define humane treatment as "the care and handling of livestock that seeks to minimize distress through utilization of the standards established by this chapter." ¹⁰² Furthermore, the definition of distress applies to animals that are "injured, sick, or in pain." ¹⁰³ The language specifically defines pain as "an unpleasant physical sensation occurring in varying degrees of severity as consequence of injury, disease or from a

^{98.} See id. at 157 (explaining that, according to its enabling statute, the Board has the authority to adopt rules after it goes through the Joint Committee on Agency Rule Review (JCARR) process, which requires a two-week public comment period).

^{99.} See Ohio Admin. Code 901:12 (2016) (enumerating all of the Board's current rules); see also Vick, supra note 14, at 159–64 (explaining the positive and negative aspects of the Board's regulatory actions).

^{100.} See OHIO ADMIN. CODE 901:12-10-03 (2016) (regulating the humane management of broilers and breeders within Ohio).

^{101.} Id. at 901:12-10-03(E).

^{102.} *Id.* at 901:12-3-01(K).

^{103.} Id. at 901:12-3-01(D).

medical or management procedure."¹⁰⁴ According to these definitions, the current paradigm for poultry production causes distress, pain, and suffering for the birds. ¹⁰⁵ Therefore, based on the current rules, there is room to implement changes that would increase broiler chicken welfare.

B. Proposal to Change Ohio's Existing Regulations

Although there are many fundamental flaws in modern meat production, change cannot occur overnight, and proposed regulations must be reasonable. Therefore, this Note focuses on improving upon current industry stocking standards to promote better welfare within chicken flocks. Many studies have acknowledged that increased crowding decreases overall animal welfare. However, there are discrepancies amongst scholars concerning the ideal stocking density. What the majority of studies show is that higher stocking densities correlate with increased mortality rates, reduced behavioral expression, and higher stress levels (both heat and corticosteroid) amongst the chicken populations.

Veterinary studies also show that chickens experiencing lameness suffer immense pain. ¹⁰⁹ Because the chickens are unable to move and extend their limbs properly, many birds suffer from weak muscles that

^{104.} Id. at 901:12-3-01(L).

^{105.} See supra Part I (enumerating the welfare consequences of poultry production).

^{106.} See S. Buijs et al., Stocking Density Effects on Broiler Welfare: Identifying Sensitive Ranges for Different Indicators, 88 POULTRY SCI. 1536, 1540 (2009) (finding that higher stocking densities decreased leg strength and increased dermatitis and fearfulness in broiler chickens); Hall, supra note 42, at 37 ("In general, an increase in stocking density leads to a reduction in the 'margins of safety' in rearing."); E.A.M. Bokkers et al., Space Needs of Broilers, 20 ANIMAL WELFARE 623, 631 (2011) (determining that the ideal stocking density must not exceed 39.4 kg/m²).

^{107.} See Bokkers et al., supra note 106, at 630–31 (explaining that the European Union (EU) established a maximum stocking density of 33 kg/m², but the Scientific Committee of the EU suggests that the stocking density must be equal or below 25 kg/m²).

^{108.} See Brian D. Fairchild, Broiler Production Systems: The Ideal Stocking Density?, POULTRY SITE (Apr. 18, 2005), http://www.thepoultrysite.com/articles/322/broiler-production-systems-the-ideal-stocking-density/ ("At higher stocking densities the birds grew slower, were jostled more and had reduced walking ability."); see also N. Imaeda, Influence of the Stocking Density and Rearing Season on Incidence of Sudden Death Syndrome in Broiler Chickens, 79 POULTRY SCI. 201, 203 (2000) (suggesting that higher stocking densities increase economic loss from Sudden Death Syndrome (SDS)); Bokkers et al., supra note 106, at 629 ("[B]irds in a high density situation might express behaviour to a lesser extent because birds do have less space."); Hall, supra note 42, at 30–37 (discussing that, after detailed study, higher stocking densities lead to lying down more frequently, decreased walking, decreased pecking (as a normal behavior in nature), higher mortality, increased frequency of severe leg problems, exacerbated heat stress, and overall poor welfare).

^{109.} See TURNER ET AL., supra note 66, at 11 (citing a study that found chickens experiencing skeletal problems and lameness chose to eat food laced with painkillers more often than food without carprofen; they were also able to complete an obstacle course faster after receiving the drug).

provide inadequate skeletal support. 110 Therefore, as skeletal disorders occur more frequently in higher stocking densities, decreasing the number of chickens per space will also reduce pain and distress. Based on the available science, Ohio should implement a maximum stocking density to increase overall chicken welfare within the state.

Based on the standards and the studies provided by the European Union (EU) Scientific Committee on Animal Health and Animal Welfare (SCAHAW), the suggested stocking density focuses on weight rather than chickens per square foot. Using a weight standard is preferable because it takes into account that each bird is a living creature, growing in various shapes and sizes. According to SCAHAW, the ideal amount of space is 25 kg/m², which equates to 5 lbs. per square foot. This space allotment aims to increase overall body area and behavioral expression, and improve the social and emotional welfare of the animals. Thus, the proposed language is as follows:

To eliminate undue pain and distress, [s]tocking densities must not exceed 5 lbs. per square foot and must allow all broilers to rest at the same time without being forced to rest on top of each other at all stages of production and, in addition, all broilers must be able to access feed and water without excessive competition that prevents individuals in the flock from expressing their natural behaviors and maintaining normal and healthy body condition[s]. 114

Currently, industry practices allot only about half a square foot of space per chicken by the time they have grown to slaughter weight. As most producers process the birds for meat at 4.5 lbs., each bird would have about a square foot to move—double the current industry space requirements. By doubling the space per chicken, the industry could

^{110.} Id.

^{111.} See Bokkers et al., supra note 106, at 631 (explaining that because "birds grow and become larger with age," a stocking density requirement based on weight rather than number of birds "assures a certain amount of space when birds become heavier").

^{112.} *Id*.

^{113.} See Jacob, supra note 47 (explaining that chickens naturally groom themselves through preening, fighting each other, foraging by pecking and scratching at the ground, engaging in perching, and dust bathing); see also Hall, supra note 42, at 30–37 (stating that crowded conditions suppress the chickens' natural behaviors).

^{114.} The italicized language indicates proposed changes to Ohio Administrative Code 901:12-10-03(E)(4).

^{115.} Fox, *supra* note 4, at 31.

^{116.} See JUDITH LESSLER ET AL., GROWER GUIDELINES FOR POULTRY AND FOWL PROCESSING 3 (2007), https://www.researchgate.net/publication/268259036_Grower_Guidelines_for_Poultry_and_

significantly reduce the skeletal, behavioral, and safety problems of overcrowding, and increase animal welfare drastically. 117

Also, decreasing stocking densities can reduce economic losses for chicken producers. 118 According to scientific research, when chickens are kept in high-density housing the daily mortality tends to be higher. 119 Evidence also shows that, in larger populations, the animals experience varying degrees of carcass damage, which negatively affects the quality of the meat.¹²⁰ Current industry standards impair product quality because, at higher densities, the birds experience more bruising, contact dermatitis, and scratching that may become infected by Escherichia Coli (E. Coli). 121 This contamination reduces the selling price of the meat at the market. 122 Therefore, the profitability of chicken—as a product—decreases along with the animal's welfare. Studies have also linked Sudden Death Syndrome (SDS), a disease that "represents a major economic loss to the broiler industry," with overcrowding. 123 SDS causes the animals to go into acute cardiac arrest, often because of increased stress to the bird. 124 Therefore, reducing stocking densities bears a rational relation to lessening economic losses in conventional poultry farming.

Although overstocking reduces bird performance, many industry proponents argue that larger, crowded conditions are necessary for cost effectiveness. ¹²⁵ While reduced stocking densities decreases the economic benefits per square foot, the welfare benefits may increase the profitability of the meat product. ¹²⁶ In fact, according to a Consumer Reports survey, 80% of respondents claimed that they want "good living conditions" for

- 121. Id. at 36.
- 122. See id. (inferring that the skin infection of the stock bird affects the sale price).
- 123. Imaeda, *supra* note 108, at 201.
- 124. Siddiqui et al., Sudden Death Syndrome—An Overview, 2 VETERINARY WORLD 444, 445 (2009).

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Fowl_Processing_Prepared_by (enumerating the various slaughter weights of different poultry products).

^{117.} See Hall, supra note 42, at 37 (identifying the health benefits of reduced stocking densities).

^{118.} Id. (demonstrating that more room per bird correlates with fewer economic losses).

^{119.} See id. at 28 (finding that, at higher densities, total mortality was between 5.92% to 8.94%).

^{120.} Id. at 36-37.

^{125.} A. Verspecht et al., *Economic Impact of Decreasing Stock Densities in Broiler Production in Belgium*, 90 POULTRY SCI. 1844, 1845 (2011) (responding to the EU's standards, which serve as the foundations for this proposal).

^{126.} See ANIMAL WELFARE INST., CONSUMER PERCEPTIONS OF FARM ANIMAL WELFARE 1, https://awionline.org/sites/default/files/uploads/documents/fa-consumer_perceptionsoffarmwelfare_-112511.pdf (last visited Apr. 17, 2018) (stating that American consumers have become "increasingly aware of, and concerned about, how animals raised for food are treated").

farm animals raised for food. 127 Further, 69% of the report's sample said that animal welfare significantly influences their food purchases. 128 A survey produced by Ohio State University stated that 59% of Ohioans would be willing to pay more for meat, poultry, or dairy produced from humanely treated animals. 129 Of the Ohioans surveyed, 12% stated they would pay up to 25% more for meat raised in higher welfare conditions. 130 Thus, with increased welfare marketability, producers may recover some of the losses that occur from reducing stocking densities by raising the demand and the price of their meat. 131

C. California's Proposition Two and Other State Legislation

If Ohio implemented a sales ban, it would not be the first state to enact legislation protecting animal welfare in the context of farm animals. ¹³² A sales ban prohibits the sale of products that do not conform to the laws within the state, both for in-state and out-of-state producers. ¹³³ In 2008, California passed a voter initiative banning battery cages, gestation crates, and veal crates. ¹³⁴ The State promulgated the law under the California Health and Safety Code, based on the negative health consequences associated with rearing animals in harsh confinement settings. ¹³⁵ In 2010, California amended the Code to include a shelled-egg ban for the import and sale of eggs produced by hens in battery cages. ¹³⁶ The pertinent language of the amendment states:

^{127.} Id. at 2.

^{128.} Id.

^{129.} Id. at 9.

^{130.} *Id*.

^{131.} See Hall, supra note 42, at 37 ("Most studies have shown an increase in stocking density to result in a reduced monetary return per bird but an increased output per unit floor area.").

^{132.} See Missouri v. Harris, 58 F. Supp. 3d 1059, 1062 (E.D. Cal. 2014) (describing California's legislation regarding the sale of shell eggs), aff'd, 847 F.3d 646 (9th Cir. 2017); see also Association des Eleveurs de Canards et D'Oies du Quebéc v. Harris, 729 F.3d 937, 947 (9th Cir. 2013) (upholding California's foie gras ban).

^{133.} See, e.g., Dan Charles, How California's New Rules Are Scrambling the Egg Industry, NAT'L PUB. RADIO (Dec. 29, 2014, 6:07 PM), http://www.npr.org/sections/thesalt/2014/12/29/3738028 58/how-californias-new-rules-are-scrambling-the-egg-industry (explaining that the California sales ban precluded out-of-state egg producers from selling their products in the State if they failed to comply with Proposition 2's standards).

^{134.} California Proposition 2, Standards for Confining Farm Animals (2008), BALLOTPEDIA, [hereinafter Proposition 2], https://ballotpedia.org/California_Proposition_2,_Standards_for_Confining_Farm Animals (2008) (last visited Apr. 17, 2018).

^{135.} CAL. HEALTH & SAFETY CODE §§ 25990–25994 (2015).

^{136.} California Egg Law Can't Be Challenged by Other States, Judges Say, MERCURY NEWS (Nov. 17, 2016, 12:40 P.M.), http://www.mercurynews.com/2016/11/17/california-egg-law-cant-be-challenged-by-other-states-judges-say/.

Commencing January 1, 2015, a shelled egg shall not be sold or contracted for sale for human consumption in California if the seller knows or should have known that the egg is the product of an egg-laying hen that was confined on a farm or place that is not in compliance with animal care standards set forth in Chapter 13.8 (commencing with Section 25990). ¹³⁷

The purpose of the egg ban—according to the California Legislature—was to protect the public health of residents. ¹³⁸ Based on the statutory language, *Salmonella* is the most common food-borne illness. ¹³⁹ Further, the Code provides evidence that *Salmonella* is more frequent in confinement conditions that subject egg-laying hens to high stress. ¹⁴⁰ In fact, studies show that "[h]ens in battery cages are under high stress, which inhibits their natural immune response." ¹⁴¹ The heightened stress levels and depressed immune systems increase the prevalence of *Salmonella* infections in caged hens. ¹⁴² Additionally, scientific evidence suggests that the *Salmonella* risk is up to 25 times higher in battery hens than egg-laying chickens raised on cage-free farms. ¹⁴³ Therefore, battery cages do increase the public health risk of contracting a foodborne illness.

After California enacted the sales ban, Missouri, Oklahoma, Alabama, Kentucky, and Iowa brought a constitutional challenge against the ban. 144 Typically, associations such as the United Egg Producers (UEP) would be the ones bringing a constitutional challenge against similar laws based on associational standing. 145 However, in the case of Proposition Two, UEP changed sides and forged a partnership with the Humane Society to work together toward enacting federal legislation that would improve the life of egg-laying hens. 146 Therefore, UEP could not be a plaintiff in the case

^{137.} CAL. HEALTH & SAFETY § 25996.

^{138.} Id. § 25995(e).

^{139.} Id. § 25995(d).

^{140.} See id. § 25995(c) ("Egg-laying hens subjected to stress are more likely to have higher levels of pathogens in their intestines ").

^{141.} Sarah McNabb, Comment, California's Proposition 2 Has Egg Producers Scrambling: Is It Constitutional?, 23 SAN JOAQUIN AGRIC. L. REV. 159, 167 (2013).

^{142.} Id.

^{143.} Id.

^{144.} Missouri v. Harris, 58 F. Supp. 3d 1059, 1062 (E.D. Cal. 2014), aff'd sub nom. Missouri ex rel. Koster v. Harris. 847 F.3d 646 (9th Cir. 2017).

^{145.} See Hunt v. Wash. State Apple Advert. Comm'n, 432 U.S. 333, 343 (1977) (establishing the test for associational standing, which requires an individual member have an injury-in-fact to have standing to sue in their own right).

 $^{146. \ \ \}textit{Egg Industry Agree to Promote Federal Standards for Hens}, \ \text{Humane Soc'y U.S.} \ (July \ 7, 2011), \ \text{http://www.humanesociety.org/news/press_releases/} \ 2011/07/egg_agreement.html.}$

against California's egg-sales ban. ¹⁴⁷ Instead, the states brought a claim based on the *parens patriae* doctrine arguing that each state had a "quasi-sovereign interest[] in protecting its citizens' economic health and constitutional rights as well as preserving its own rightful status within the federal system." ¹⁴⁸ The California trial court rejected this argument and concluded that the states lacked standing to sue based on the *parens patriae* doctrine because they could not demonstrate that any of their citizens had suffered an injury-in-fact. ¹⁴⁹ Therefore, the court dismissed the case and upheld Proposition Two. ¹⁵⁰

In response to the lower court's decision, Missouri and the other states appealed to the Ninth Circuit Court of Appeals. ¹⁵¹ The Ninth Circuit affirmed and remanded the decision, agreeing that the states lacked standing. ¹⁵² Finally, on May 30, 2017, in response to another appeal by the states, the Supreme Court of the United States denied *certiorari* to hear the Proposition Two case. ¹⁵³ Therefore, without evidence of an injury-in-fact, the likelihood that courts would overturn similar sales bans in other states is remote.

In November 2016, Massachusetts's constituents voted for a similar ban within the state, referred to as "Question 3."¹⁵⁴ The proposed language of the law was strikingly similar to that of Proposition Two.¹⁵⁵ By passing Question 3, Massachusetts took steps to eradicate cruel confinement practices—such as veal and gestation crates—and to ban the sale of caged eggs within state boundaries.¹⁵⁶ Before placing the question on the ballot,

^{147.} Pamela Vesilind, *Did the Dismissal of* Missouri v. Harris *Have an Unanticipated Effect*?, AGRIC. & FOOD L. BLOG (Oct. 7, 2014, 5:45 PM), http://aglaw.blogspot.com/2014/10/did-dismissal-of-missouri-v-harris-have.html.

^{148.} Harris, 58 F. Supp. 3d at 1064.

^{149.} Id. at 1072.

^{150.} Id. at 1079.

^{151.} See Missouri ex rel. Koster v. Harris, 847 F.3d 646, 651 (9th Cir. 2017) (appealing the district court's ruling that states lacked standing under the parens patriae doctrine).

^{152.} Id. at 656.

^{153.} See Supreme Court Rejects Challenge to California's Landmark Egg Sales Law, HUMANE SOC'Y U.S. (May 30, 2017), http://www.humanesociety.org/news/press_releases/2017/05/supreme-court-upholds-ca-egg-law-053017.html?credit=web_id96878129 (claiming that the Supreme Court found the facts presented far too speculative).

^{154.} Joshua Miller, *Question 3 Is Approved in Massachusetts*, BOST. GLOBE (Nov. 8, 2016), https://www.bostonglobe.com/metro/2016/11/08/voters-decide-measure-mandate-cage-free-eggs/BGJT X5ETCt2pKppz9AqTTM/story.html.

^{155.} Compare Question 3, supra note 11 (detailing the proposed language of Question 3), with Proposition 2, supra note 134 (detailing the language of Proposition Two).

^{156.} See Question 3, supra note 11 (describing the proposed bans on confinement practices and egg sales within Massachusetts).

the highest court in Massachusetts ruled in favor of the proposed law.¹⁵⁷ This decision provides encouragement for the Ohio proposal and suggests that the courts may uphold a challenge to the sales ban. Applying Massachusetts and California precedent, the Board's sales ban on products raised in a manner that causes the chickens pain or distress may likely survive a legal challenge.

D. Implementing a Sales Ban in Ohio

In a separate statute, the Board should implement a sales ban on animal products raised in conditions that cause undue pain or distress. This Note will only discuss language concerning broiler chickens. However, this directive could apply to all animals raised for meat within the state of Ohio. The proposed regulation, adapted from the Massachusetts ¹⁵⁸ and California ¹⁵⁹ laws, states:

Notwithstanding any general or special law to the contrary, it shall be unlawful for a business owner or operator to knowingly engage in the sale within the State of Ohio of any poultry product that the business owner or operator knows or should know is the result of overcrowded conditions that cause *undue pain or distress*¹⁶⁰ to the poultry bird.

Like the proposed Massachusetts law—which the state affirmed in 2016—the sales ban would impose a maximum civil penalty of \$1,000 for each violation of the statute. The statute should also include a severance clause to preserve and confine each section of the Act individually in case of any legal challenges. Overall, the sales ban is important to preserve the

^{157.} Shira Schoenberg, Mass. Supreme Judicial Court Upholds Farm Animal Ballot Question Banning "Extreme" Confinement, MASSLIVE (July 6, 2016, 1:17 P.M.), http://www.masslive.com/politics/index.ssf/2016/07/sjc upholds farm animal ballot.html.

^{158.} See An Act to Prevent Cruelty to Farm Animals, MASS. GEN. LAWS, ch. 333, §§ 1, 2 (2016) (implementing a sales ban on eggs raised in a "cruel manner").

^{159.} See CAL. HEALTH & SAFETY CODE § 25996 (2015) (implementing a similar sales ban on egg products raised in a way not in compliance with the animal care standards of the state).

^{160.} See OHIO ADMIN. CODE 901:12-3-01(L) (2016) (defining pain as "an unpleasant physical sensation occurring in varying degrees of severity as consequence of injury, disease or from a medical or management procedure"); id. at 901:12-3-01(D) ("Distress' occurs when livestock are injured, sick, or in pain.").

^{161.} MASS. GEN. LAWS ch. 333, § 6 (2016).

^{162.} See id. § 9 ("The provisions of this Act are severable and if any clause, sentence, paragraph or section of this Act, or an application thereof, shall be adjudged by any court of competent jurisdiction to be invalid, such judgment shall not affect, impair, or invalidate the remainder thereof but shall be confined in its operation to the clause, sentence, paragraph, section or application adjudged invalid.").

integrity of the welfare amendments, protect the farmers and chickens, and inspire legislative changes in other poultry-producing states.

III. DOES A SALES BAN ON CHICKEN PRODUCTS VIOLATE THE DORMANT COMMERCE CLAUSE?

The Constitution grants Congress the affirmative power to "regulate Commerce with foreign Nations, and among the several States, and with the Indian Tribes." This "Commerce Clause" gives Congress broad authority over laws that may have a freezing effect on interstate commerce. Has defrom this direct deferral of power, there is also a negative demand on the states—known as the Dormant Commerce Clause—which restricts state actions that impermissibly burden interstate commerce. However, the Commerce Clause does not grant Congress unlimited authority over state laws that may have an *incidental* effect on commerce. States retain sovereign authority to regulate activities within their borders, so long as the state regulation does not place an impermissible burden on interstate commerce, discriminate against other states, or protect in-state businesses to the detriment of interstate commerce. However, How

States remain the gateway point for influencing higher animal welfare standards. ¹⁶⁸ Although the courts have yet to come to a consensus concerning the Dormant Commerce Clause in regards to sales bans, the Ninth Circuit Court of Appeals held that certain animal welfare laws are even-handed and not necessarily discriminatory. ¹⁶⁹ In Association des Eleveurs de Canards et D'Oies du Quebec v. Harris (hereinafter Foie Gras), the Ninth Circuit found that California's foie gras ban did not violate

^{163.} U.S. CONST. art. I, § 8, cl. 3.

^{164.} See Gibbons v. Ogden, 22 U.S. (9 Wheat.) 1, 10 (1824) (emphasizing that the Constitution relegated the control of Commerce to Congress).

^{165.} See Brian L. Hazen, Comment, Rethinking the Dormant Commerce Clause: The Supreme Court as Catalyst for Spurring Legislative Gridlock in State Income Tax Reform, 2013 BYU L. REV. 1021, 1027 ("The Supreme Court has inferred that the Constitution's exclusive grant of commerce power to Congress prohibits, by negative implication, regulation of interstate commerce by the states themselves.").

^{166.} See Pike v. Bruce Church, Inc., 397 U.S. 137, 142 (1970) (finding that states may pass legislation, which may have an incidental effect on interstate commerce, so long as the law does not create an excessive burden compared to the local benefits).

^{167.} See Hunt v. Wash. State Apple Advert. Comm'n, 432 U.S. 333, 350–52 (1977) (holding a law that is discriminatory in effect is unconstitutional); see also Hughes v. Oklahoma, 441 U.S. 322, 336–37 (1979) (finding that a law that is facially discriminatory is unconstitutional).

^{168.} See ALDF, supra note 7 ("There are no federal laws governing the conditions in which farmed animals are raised?" (emphasis omitted)).

^{169.} Association des Eleveurs de Canards et D'Oies du Quebéc v. Harris, 729 F.3d 937, 947 (9th Cir. 2013).

the Dormant Commerce Clause.¹⁷⁰ The court determined the law was not discriminatory because it did not distinguish between in-state and out-of-state producers.¹⁷¹ In addition, the Ninth Circuit held that the foie gras ban did not overwhelmingly burden interstate commerce.¹⁷² The court notably reasoned in the *Foie Gras* case that, just because one method of production is technically "more profitable," a state is not precluded from imposing sales bans to promote a beneficial state interest.¹⁷³ Therefore, precedent holds that courts would likely uphold as constitutional a sales ban of poultry products raised in a cruel manner.

A. The Commerce Clause

The Constitution delegates to Congress the power to regulate commerce among the states.¹⁷⁴ Initially, the Court interpreted this power broadly, leaving comprehensive discretion to Congress.¹⁷⁵ *Gibbons v. Ogden* advanced the idea that "the United States is an economic unit and that commerce... must be under national and not state control." ¹⁷⁶ Statements made at the Federal Convention indicate that granting Congress the power to regulate commerce was intended to prevent retaliatory actions that could hinder interstate harmony. ¹⁷⁷ Accordingly, the far-reaching power of Congress was timely for a growing nation. ¹⁷⁸ In other words, restricting state power over interstate commerce was conducive to the country's growth. ¹⁷⁹ As such, any state transactions "reaching across state boundaries" will be in Congress's purview. ¹⁸⁰ For many years, the courts upheld Congress's absolute control of commerce, leaving the states with very little discretion to influence transactions that were not purely local. ¹⁸¹

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170. Id. at 947.
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^{171.} Id. at 948.

^{172.} Id. at 949.

^{173.} Id. at 952.

^{174.} U.S. CONST. art. I, § 8, cl. 3.

^{175.} See Gibbons v. Ogden, 22 U.S. (9 Wheat.) 1, 196–97 (1824) ("This [commerce] power, like all others vested in Congress, is complete in itself, may be exercised to its utmost extent, and acknowledges no limitations, other than [what] are prescribed in the constitution.").

^{176.} George L. Haskins, John Marshall and the Commerce Clause of the Constitution, 104 U. PA. L. REV. 23, 25 (1955).

^{177.} Id. at 26.

^{178.} Id. at 27.

^{179.} Id.

^{180.} Id. at 32 (quoting United States v. South-Eastern Underwriters Ass'n, 322 U.S. 533, 552 (1944)).

^{181.} See United States v. Darby, 312 U.S. 100, 118 (1941) (holding that Congress may regulate intrastate activities, such as wages, that extend to interstate commerce); see also Heart of Atlanta Motel, Inc. v. United States, 379 U.S. 241, 258 (1964) (establishing that Congress has the power to regulate

However, over time, this exceedingly broad power granted to Congress has been chipped away, leaving more room for state action.¹⁸²

B. Tenth Amendment Limitations to the Commerce Clause

The Tenth Amendment states that "[t]he powers not delegated to the United States by the Constitution, nor prohibited by it to the States, are reserved to the States respectively, or to the people." This language limits the broad authority over commerce once granted to Congress. 184 According to the Supreme Court, activities that are local and do not substantially impede interstate trade are within the state's powers. 185 Further, the states have police power, which is the residual authority deferred to the states in areas unregulated by Congress. 186 These areas typically include regulations that promote "public health, public safety, and public morality." 187 Accordingly, the Supreme Court granted states "unlimited jurisdiction over all persons and things, within its territorial limits "188 Unless a state regulation violates the Constitution, the police powers allow the states to pass legislation that protects the general public welfare by any means conducive to this purpose. 189 The scope of the police powers thus becomes a question of degree. 190 Whether a regulation is a valid exercise of state authority will depend on the weight that the legislation places on interstate commerce.191

[&]quot;local activities in both the States of origin and destination, which might have a substantial and harmful effect upon that commerce").

^{182.} Santiago Legarre, *The Historical Background of the Police Power*, 9 U. PA. J. CONST. L. 745, 782 (2007) ("[T]he framers of the constitution did not intend to restrain the States in the regulation of their civil institutions" (quoting Dartmouth Coll. v. Woodward, 17 U.S. (4 Wheat.) 518, 629 (1819))).

^{183.} U.S. CONST. amend. X.

^{184.} See United States v. Lopez, 514 U.S. 549, 568 (1995) (distinguishing between regulations that are "truly national" and "truly local").

^{185.} Id. at 559, 568.

^{186.} U.S. CONST. amend. X; see also Lopez, 514 U.S. at 567 (stating that the state police powers should take precedence over laws that are local in nature).

^{187.} Legarre, supra note 182, at 787.

^{188.} City of New York v. Miln, 36 U.S. (11 Pet.) 102, 139 (1837).

¹⁸⁹ *Id*

^{190.} See Okla. Tax Comm'n v. Jefferson Lines, Inc., 514 U.S. 175, 179–80 (1995) (stating that the Commerce Clause contains a negative command referred to as the Dormant Commerce Clause, which invalidates state laws "even when Congress has failed to legislate on the subject" if they place "burdens on the flow of commerce").

^{191.} See id. (reasoning that the purpose of the Commerce Clause is to prevent a state from adopting protectionist economic measures).

C. The Dormant Commerce Clause

The Commerce Clause provides Congress with the power to limit state and local regulations that may affect interstate commerce; courts refer to this as the "negative" or Dormant Commerce Clause. 192 Historically, Congress was able to preempt any state regulation that placed "an undue burden on interstate commerce" by discriminating against other states. 193 However, the Dormant Commerce Clause asks the question: in the absence of federal legislation, should the courts invalidate state laws because they place an undue burden on interstate commerce?¹⁹⁴ The courts answer this question using a balancing approach. 195 In other words, the courts weigh the benefits that a local law provides against the burden that the law places on interstate commerce. 196 The balancing approach will vary based on whether the law is discriminatory or non-discriminatory. 197 A state law is discriminatory if the legislative action benefits in-state residents at the expense of out-of-staters. 198 Some state laws might discriminate more overtly than others; therefore, the Court has created several tests under the Dormant Commerce Clause. 199

1. Hughes v. Oklahoma: Facially Discriminatory Analysis

In *Hughes v. Oklahoma*, the Supreme Court overturned an Oklahoma law that prohibited the out-of-state transportation of commercially significant minnows for sale.²⁰⁰ Because the law affected in-state minnow producers less than out-of-state manufacturers, the Court reasoned that the statute employed discriminatory means to distinguish between in-state and out-of-state sales.²⁰¹ Thus, the law was "repugnant to the Commerce Clause."²⁰²

Although some state regulations are so local in nature that they escape judicial scrutiny, if a law promotes economic isolation, the Court has

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192. ERWIN CHEMERINSKY, CONSTITUTIONAL LAW 456 (Vicki Been et al. eds., 4th ed. 2013).
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^{193.} Id. at 457.

^{194.} *Id*.

^{195.} Id. at 464.

^{196.} Id.

^{197.} Id. at 469.

^{198.} Id.

^{199.} See, e.g., id. (describing the discriminatory factors used in Dormant Commerce Clause balancing tests).

^{200.} Hughes v. Oklahoma, 441 U.S. 322, 338 (1979).

^{201.} Id.

^{202.} Id.

adopted a per se rule of invalidity. 203 State laws that "clearly favor[] inout-of-staters" facially staters over are discriminatory unconstitutional.²⁰⁴ Economic isolation shelters the in-state producers from out-of-state competition and thus is protectionist. 205 The clearest test for determining whether a law is protectionist is if the legislation "overtly blocks the flow of interstate commerce at a State's borders."²⁰⁶ According to this test, the Court views blatantly discriminatory laws as fatally flawed.²⁰⁷ Thus, laws that draw clear lines between the states will receive the highest level of judicial scrutiny.²⁰⁸ Therefore, facially discriminatory laws are those that run amok of the Constitution and create impenetrable barriers.²⁰⁹

Unlike the *Hughes* case—which stated that "[n]o person may transport or ship minnows for sale outside the state [of Oklahoma] which were seined or procured within the waters of [the] state". The sales ban only restricts the sale of poultry products reared in overcrowded conditions that cause pain or distress to the animals. There is no prohibition on shipping chickens into or out of Ohio. Producers within the State can ship poultry products to other states. Further, subject to the higher welfare standards prescribed by the state, out-of-state chicken manufacturers can deliver their products into Ohio. While the law may have an incidental effect on out-of-state producers, the proposal does not "overtly block[] the flow of interstate commerce" by drawing lines at the borders. Thus, according to the *Hughes* test, the law is neither protectionist nor subject to strict scrutiny review.

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203. City of Philadelphia v. New Jersey, 437 U.S. 617, 623-24 (1978).
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^{204.} CHEMERINSKY, supra note 192, at 469.

^{205.} Id.

^{206.} City of Philadelphia, 437 U.S. at 624.

^{207.} Hughes, 441 U.S. at 337.

²⁰⁸ Id

^{209.} See id. at 338 (holding that Oklahoma's law was "repugnant to the Commerce Clause" because the state could have achieved the environmental benefits of conserving its minnow population by less discriminatory means).

^{210.} Id. at 323 (quoting OKLA. STAT. 29 § 4-115(B) (1978)).

^{211.} See supra Part II.B (detailing that decreasing the stocking density also decreases pain and stress).

^{212.} Id.

^{213.} City of Philadelphia v. New Jersey, 437 U.S. 617, 624 (1978); see also Pike v. Bruce Church, Inc., 397 U.S. 137, 142 (1970) (explaining that state laws with an incidental effect on interstate commerce will be upheld if the benefits outweigh the burdens to trade amongst the states).

^{214.} See Hughes, 441 U.S. at 337 ("At a minimum... facial discrimination invokes the strictest scrutiny of any purported legitimate local purpose and of the absence of nondiscriminatory alternatives.").

2. Hunt v. Washington State Apple Advertising Commission: Discriminatory-in-effect Analysis

In contrast to facially discriminatory laws, some state rules may appear to be facially neutral, but still discriminatory in effect. Hunt v. Washington State Apple Advertising Commission established the presiding test for recognizing facially neutral laws. To determine whether a law is protectionist despite appearing impartial, the Court must conclude that the law has an underlying discriminatory purpose or effect. A state may not create a "leveling effect" by enacting legislation that puts its commercial activities on par with an economically competitive state. In other words, a state cannot enact legislation that creates an artificial advantage in interstate commerce. If the Court finds an underlying discriminatory purpose or effect, the burden will fall on the state to demonstrate that less discriminatory means were unavailable to preserve the local interests at stake. Absent proof that nondiscriminatory alternatives were unavailable, a state law will be unable to withstand judicial scrutiny.

The *Hunt* test established that states may not use legislation to protect residents from outside competition by enacting laws that have a discriminatory purpose or effect.²²² In *Hunt*, North Carolina passed a law, requiring that all apples shipped into the state bear only USDA-grade labels.²²³ This legislative action had a discriminatory effect on Washington—the largest apple producer in the nation—because the state had its own superior grading system.²²⁴ Thus, by enacting the labeling regulation, North Carolina created an economic advantage that benefitted local apple producers.²²⁵ In effect, North Carolina discriminated against Washington apple producers by artificially leveling the playing field.²²⁶

^{215.} See CHEMERINSKY, supra note 192, at 473–74 ("[F]acially neutral laws can be found to be discriminatory if they either have the purpose or the effect of discriminating against out-of-staters.").

^{216.} See Hunt v. Wash. State Apple Advert. Comm'n, 432 U.S. 333, 352 (1977) (finding that a North Carolina law was facially neutral when it required that out-of-state apple containers bear only an inferior label).

^{217.} Id. at 374.

^{218.} See id. at 351 (overturning the North Carolina law because made the state as competitively equal as Washington, which had its own superior seal).

^{219.} Id. at 351-52.

^{220.} Id. at 353.

^{221.} *Id*.

^{222.} See id. at 352–53 (finding that, despite appearing facially neutral, the law promulgated by North Carolina had a discriminatory impact on Washington apple growers).

^{223.} Id. at 335.

^{224.} Id. at 336.

^{225.} Id. at 351.

^{226.} Id.

Further, the state was unable to demonstrate that less discriminatory means were unavailable to promote its legitimate state interests. ²²⁷ The Ohio referendum does not suffer the same fatal flaw.

Ohio's proposed legislative amendment is neither discriminatory in purpose nor in effect. ²²⁸ The language of the suggested amendment requires both in-state and out-of-state chicken producers to comply with higher welfare practices. ²²⁹ Therefore, a sales ban does not create a competitive advantage for Ohio chicken growers. Also, the Court has held that states maintain "a residuum of power in the state to make laws governing matters of local concern which nevertheless . . . affect interstate commerce ²²³⁰ Further, this power is especially strong when a state law seeks to protect its residents "in matters pertaining to the sale of foodstuffs." ²³¹ This does not overturn the discriminatory-in-effect test, but it does provide persuasive evidence that local benefits outweigh any incidental effects on interstate commerce. Thus, by this logic, Ohio has the power to regulate the sale of chicken within its borders because the law is neither discriminatory nor protectionist. For these reasons, the *Hunt* test is not the appropriate standard to apply when reviewing the proposed statutory amendment.

Opponents may argue that the Ohio law is discriminatory in effect. This argument would likely contest that the Ohio law creates a competitive advantage for in-state chicken growers. However, this is not the case. According to the Ohio Poultry Association, agriculture is Ohio's largest industry, and poultry production contributes significantly to the state's economy.²³² In fact, Ohio produces 475 million pounds of broiler chickens per year, generating \$277 million in profits.²³³ The industry is also responsible for the creation of nearly 4,238 jobs and \$151 million dollars in

^{227.} Id. at 353.

^{228.} See supra Part II.D ("Notwithstanding any general or special law to the contrary, it shall be unlawful for a business owner or operator to knowingly engage in the sale within the State of Ohio of any poultry product that the business owner or operator knows or should know is the result of overcrowded conditions that cause *undue pain or distress* to the poultry bird.").

^{229.} See supra Part II ("To eliminate undue pain and distress, [s]tocking densities must not exceed 5 lbs. per square foot and must allow broilers to rest at the same time without being forced to rest on top of each other at all stages of production and, in addition, all broilers must be able to access feed and water without excessive competition that prevents individuals in the flock from expressing their natural behaviors and maintaining normal and healthy body condition[s].").

^{230.} See Hunt v. Wash. State Apple Advert. Comm'n, 432 U.S. 333, 350 (1977) (quoting S. Pac. Co. v. Arizona, 325 U.S. 761, 767 (1945)).

^{231.} *Id.*; see also Fla. Lime & Avocado Growers, Inc. v. Paul, 373 U.S. 132, 146 (1963) ("[N]either logic nor precedent invites any distinction between state regulations designed to keep unhealthful . . . commodities off the grocer's shelves, and those designed to prevent the deception of consumers.").

^{232.} OHIO POULTRY ASS'N, supra note 18.

^{233.} Id.

earnings.²³⁴ Consequently, by implementing a sales ban, Ohio is merely regulating an area of local concern. In addition, unlike *Hunt*, the Ohio rules do not remove a competitive advantage from out-of-state producers because there is no labeling requirement indicating any quality standard. Therefore, the sales ban is not discriminatory in effect and would not have a substantial impact on interstate commerce.

3. Pike v. Bruce Church, Inc.: Even-handed Balancing Approach

If a state law treats both in-state and out-of-state individuals the same, then the law is nondiscriminatory.²³⁵ Unlike laws that discriminate against out-of-staters, even-handed laws receive less scrutiny.²³⁶ When a state law has an effect on interstate commerce—even though it applies equally to residents and non-residents—the Court will apply a balancing test. This balancing test, established in *Pike v. Bruce Church, Inc.* states:

Where the statute regulates even-handedly to effectuate a legitimate local public interest, and its effects on interstate commerce are only incidental, it will be upheld unless the burden imposed on such commerce is clearly excessive in relation to the putative local benefits. If a legitimate local purpose is found, then the question becomes one of degree. And the extent of the burden that will be tolerated will of course depend on the nature of the local interest involved, and on whether it could be promoted as well with a lesser impact on interstate activities.²³⁷

Therefore, states may pass laws that impact interstate commerce as long as they can show the law is necessary to protect their citizens and the burden on interstate commerce is not excessive. ²³⁸ When analyzing the benefits, the Court should look at whether the state legislation is within a "field of safety where the propriety of local regulation has long been recognized"²³⁹ According to the *Pike* test, if a state can establish that the local benefits clearly outweigh the burden on interstate commerce, the law is a constitutional exercise of state sovereignty. ²⁴⁰

^{234.} Id.

^{235.} CHEMERINSKY, supra note 192, at 487.

^{236.} Id. at 488.

^{237.} Pike v. Bruce Church, Inc., 397 U.S.137, 142 (1970) (internal citations omitted).

^{238.} Id.

^{239.} Id. at 143 (quoting S. Pac. Co. v. Arizona, 325 U.S. 761, 796 (1945) (Douglas, J., dissenting)).

^{240.} Id. at 142.

The proposed amendment, developed earlier in this Note, does not distinguish between out-of-state or in-state chicken producers. Therefore, the law would apply evenhandedly to all poultry manufacturers. Although the sales ban would incidentally influence interstate commerce, the environmental, improved welfare, and public health benefits preserve a legitimate state interest in maximizing the integrity of its broiler chicken industry. The law would prohibit the import of poultry products raised contrary to the proposed welfare standards, just as California prohibited the sale of eggs raised in battery cages. Although the sale of eggs raised in battery cages. Although the benefits to public safety, health, and the environment significantly outweigh any incidental effect on the transportation and sale of poultry into and out of the state.

D. Ohio's Balancing Test

1. Ohio's Public Health Concerns

As a valid exercise of their police powers, states may demonstrate that regulating public health concerns outweighs any incidental burden on interstate commerce.²⁴⁴ California strategically promulgated Proposition Two under its Health and Safety Code.²⁴⁵ According to the California Code, when chickens are subject to high levels of stress, the increased exposure to foodborne pathogens puts the public at risk.²⁴⁶ Therefore, implementing a sales ban on eggs raised in battery cages promoted a legitimate state interest by protecting the health and safety of California's citizenry. Similarly, Ohio could argue that the sales ban on poultry products also prevents a significant public health concern.

According to Congress, public health and welfare are legitimate state interests.²⁴⁷ Therefore, because Ohio can prove that overcrowding of

^{241.} See supra Part II (proposing language that does not distinguish the origins of the poultry products).

^{242.} See Parker v. Brown, 317 U.S. 341, 367 (1943) (recognizing that states have a legitimate interest in "prevent[ing] the demoralization of . . . industry").

^{243.} See Cal. Health & Safety Code \S 25996 (2012) (banning the sale of eggs raised in battery cages).

^{244.} Legarre, *supra* note 182, at 787 (quoting Westel Woodbury Willoughby, The Constitutional Law of the United States 1766–67 (2d ed. 1929)).

^{245.} See Cal. Health & Safety Code \S 25990–25994 (2015) (categorizing Proposition Two under "Miscellaneous Health and Safety Provisions").

^{246.} Id. § 25995.

^{247.} See Huron Portland Cement Co. v. City of Detroit, 362 U.S. 440, 445–46 (1960) (upholding and recognizing the legitimacy of a law that protects "dangers to the public heath and welfare, injury to agricultural crops . . . damage to and deterioration of property, and hazards to air and ground transportation, from air pollution").

chickens poses a significant public health issue, the proposed regulations outweigh the burden to interstate commerce. First, poultry products are often ground zero for *Salmonella*, which infects up to 1.2 million people per year. Studies show that overcrowding increases the risk of *Salmonella* among flock populations. Based on this information, Ohio could argue that controlling and improving broiler chicken welfare is essential for "maintaining intestinal integrity, obtaining satisfactory performance indices and decreasing susceptibility to *Salmonella* infection." Further, when raised in higher stocking density conditions, chickens are more prone to developing scratches, which often become infected by E. Coli bacteria. Therefore, overcrowding in broiler chicken production increases risks of foodborne pathogens for consumers, placing the regulation in the purview of the state.

Because of the higher incidence of disease in broiler chickens raised in packed conditions, many producers must use antibiotics consistently.²⁵² The frequent use of drugs to prevent disease and increase growth has led to a rise in antibiotic-resistant bacteria strains.²⁵³ Due to these public health concerns, the Food and Drug Administration recently issued guidance to "promote the judicious use of medically important antimicrobial drugs in food animals."²⁵⁴ Therefore, the agency promotes the eradication of drugs for growth reasons.²⁵⁵ However, producers may still use antibiotics to treat flock illnesses.²⁵⁶ Consequently, the risk of antibiotic resistance remains so

^{248.} Salmonella: Information for Healthcare Professionals and Laboratories, CTRS. FOR DISEASE CONTROL & PREVENTION, https://www.cdc.gov/salmonella/general/technical.html (last updated Mar. 9, 2015).

^{249.} See A.V.S. Gomes et al., Overcrowding Stress Decreases Macrophage Activity and Increases Salmonella Enteritidis Invasion in Broiler Chickens, 43 AVIAN PATHOLOGY 82, 86 (2014) ("[O]vercrowding stress decreased macrophage phagocytosis intensity and increased Salmonella Enteritidis invasion [in] the liver of the [infected] birds").

^{250.} Id. at 88.

^{251.} See Hall, supra note 42, at 36 ("The percentage of birds exhibiting wing and leg bruising increased at the higher density.").

^{252.} See Animal Agric. Alliance, Animal Agriculture: Myths and Facts, in ANIMAL ETHICS READER 236, 240 (Susan J. Armstrong & Richard G. Boltzer eds., 2d. ed. 2008) (stating that it is a myth that farm animals in confinement are disease prone, which requires farmers to routinely use antibiotics to keep them alive).

^{253.} See Richard Knox, How Using Antibiotics in Animal Feed Creates Superbugs, NAT'L PUB. RADIO (Feb. 21, 2012), http://www.npr.org/sections/thesalt/2012/02/21/147190101/how-using-antibiotics-in-animal-feed-creates-superbugs (stating that new data concerning the rise of superbugs provides a warning of "what [may] become a major public health problem").

^{254.} FDA's Strategy on Antimicrobial Resistance, FOOD & DRUG ADMIN., https://www.fda.gov/AnimalVeterinary/GuidanceComplianceEnforcement/GuidanceforIndustry/ucm21 6939.htm (last visited Apr. 19, 2018).

^{255.} Id.

^{256.} Id.

long as disease prevalence is high.²⁵⁷ Crowded conditions increase the risk for the birds to contract diseases.²⁵⁸ Correspondingly, as studies show that immunity improves with lower stocking densities, the use of antibiotics would decrease along with the number of animals per square foot.²⁵⁹ Thus, Ohio also has a legitimate public health interest in protecting its citizens from antibiotic superbugs.

In conclusion, the balancing test weighs in favor of Ohio by presenting a genuine public health concern. As Congress has mandated that public health is a state matter, the proposed regulations are a constitutional exercise of state sovereign power. ²⁶⁰ Because Ohio can provide sufficient evidence that overcrowding poses a threat to its citizenry, the Court will likely uphold the proposal as constitutional.

2. Ohio's Environmental Concerns

Not only would the sales ban apply evenhandedly, it would also be a valid regulation of Ohio's environmental concerns. In *Minnesota v. Clover Leaf Creamery Co.*, the Supreme Court upheld a Minnesota law that required milk to be sold in cardboard containers rather than plastic milk jugs.²⁶¹ Minnesota referenced the environmental benefits of the legislation.²⁶² In response to the enumerated reasons motivating the law, the Supreme Court held that the environmental benefits significantly outweighed the burdens on interstate commerce.²⁶³ Besides, Congress has recognized that environmental pollution is an issue of state and local concern.²⁶⁴

Accordingly, under this precedent, courts will likely weigh in favor of state action if a regulation concerns an environmental interest. Therefore, a state's legitimate concern in protecting the environment may be enough of a benefit for passing legislation, even if it shifts some out-of-state business. ²⁶⁵ Ohio has a legitimate environmental stake in limiting the size of industrial poultry production within its borders and imposing a sales ban on products

^{257.} Knox, supra note 253.

^{258.} Gomes et al., *supra* note 249, at 82 (finding that high stocking densities reduce immune function in the chickens).

^{259.} Id.

^{260.} Huron Portland Cement Co. v. City of Detroit, 362 U.S. 440, 445-46 (1960).

^{261.} Minnesota v. Clover Leaf Creamery Co., 449 U.S. 456, 458–61 (1981).

^{262.} See id. at 465–69 (discussing Minnesota's four legitimate environmental arguments for maintaining the legality of the state's milk-carton law).

^{263.} Id. at 471-72.

^{264.} See Huron Portland Cement Co., 362 U.S. at 446 ("Congressional recognition that the problem of air pollution is peculiarly a matter of state and local concern is manifest in [its] legislation."). 265. *Id.*

outside the scope of its legislative authority. The primary environmental concerns related to intensive poultry production are ammonia emissions and nutrient runoff that impairs water quality.²⁶⁶

According to the Food and Agricultural Organization of the United Nations (FAO), poultry production has grown more than 5% per year.²⁶⁷ Because of this growth, the industry has experienced a shift to larger facilities. 268 The integrated facilities contain higher concentrations of animals in one location.²⁶⁹ Consequently, confined poultry facilities emit significant amounts of noxious compounds, including ammonia, volatile organic compounds, and hydrogen sulfide. 270 When released into the atmosphere, ammonia can react with other components to form volatile organic compounds.²⁷¹ Atmospheric ammonia from poultry emissions has the potential to harm important plant communities and lead to acidification of soil.²⁷² Of significant concern is the fact that studies have found highly concentrated ammonia disposition up to 500 meters from the source.²⁷³ These emissions adversely affect the lives of residents living near or around poultry facilities.²⁷⁴ Therefore, Ohio can argue that regulating the size of chicken populations falls within its sovereign rights to protect the environment of the state.

In addition, the size of integrated poultry facilities often outgrows the demand for animal byproducts, such as manure.²⁷⁵ According to the Environmental Protection Agency (EPA), "[n]utrient pollution is one of America's most widespread, costly and challenging environmental problems"²⁷⁶ Consequently, pollution of soil and water from poultry

^{266.} P. Gerber et al., *Poultry Production and the Environment*, FOOD & AGRIC. ORG. U.N. 1, 3-6, http://www.fao.org/ag/againfo/home/events/bangkok2007/docs/part2/2_2.pdf (last visited Apr. 19, 2018).

^{267.} Id. at 1.

^{268.} Id.

^{269.} Id. at 2.

^{270.} Shashank Maheshwari, *Environmental Impacts of Poultry Production*, 1 POULTRY FISH & WILDLIFE SCI. 1, 1 (2013) http://www.esciencecentral.org/journals/environmental-impacts-of-poultry-production-pfw.1000101.pdf.

^{271.} Kenneth D. Casey et al., *Air Quality and Emissions from Livestock and Poultry Production/Waste Management Systems, in* ANIMAL AGRICULTURE AND THE ENVIRONMENT: NATIONAL CENTER FOR MANURE AND ANIMAL WASTE MANAGEMENT WHITE PAPERS 1, 9 (J. M. Rice et al., eds. 2006).

^{272.} Id.

^{273.} Id.

^{274.} Maheshwari, supra note 270.

^{275.} See Gerber, supra note 266, at 1 (stating that integration of the livestock industry has reduced the amount of available land to distribute the manure).

^{276.} Nutrient Pollution: The Problem, ENVTL. PROT. AGENCY, https://www.epa.gov/nutrientpollution/problem (last updated Mar. 10, 2017).

waste runoff presents significant environmental concerns for Ohio. ²⁷⁷ Facilities that use antibiotics also threaten Ohio's environmental integrity. ²⁷⁸ When antibiotics and steroids enter the water supply, rapid degradation occurs. ²⁷⁹ In fact, evidence suggests that this type of contamination can lead to "reproductive disorders in a variety of wildlife." ²⁸⁰ Therefore, in addition to the ammonia concerns, Ohio may argue that the runoff problems present a similar state interest for protecting the environment.

CONCLUSION

As established throughout this Note, in the current production model, broiler chickens experience immense suffering. Progress has already been made for laying hens and other animals confined in a cruel manner, but cage-free does not always equal better conditions. The modern broiler industry encourages raising the chickens in buildings so tightly packed that many are not able to stretch or move around, almost like being confined in a cage. The proposed legislative change nearly doubles the space per chicken and aims to reduce the suffering caused by tight conditions. Increasing the space per bird improves animal welfare by reducing the physical and behavioral costs associated with confined animal feeding operations. These improvements create a more humane industry that responds to and influences consumer behaviors. Thus, by incrementally changing the poultry industry, the nation takes steps toward a more ethical and humane food system overall.

Improving welfare alone in one state does not facilitate the necessary change around the nation. However, a sales ban inspires producers in other states to also increase their welfare practices. Based on the analysis provided in this Note, an exercise of legislative power that stimulates institutional change is constitutional. Banning products raised in a cruel manner applies to all chicken producers. The law does not put the industry of Ohio before the industry of the nation. Rather, the improved conditions

^{277.} Id.

^{278.} See Gerber et al., supra note 266, at 12 (stating that feed additives, like antibiotics, become contaminants in surface water and groundwater through excessive application of poultry waste to the land).

^{279.} *Id.* at 23 (stating that antibiotics and hormones present in surface water "have . . . long-term ecosystem effects"); Qian Sui et al., *Occurrence, Sources and Fate of Pharmaceuticals and Personal Care Products in Groundwater: A Review*, 1 EMERGING CONTAMINANTS 14, 15 (2015).

^{280.} Frank Spellman & Nancy E. Whiting, Environmental Management of Concentrated Animal Feeding Operations (CAFOs) 251 (2007).

^{281.} See Bujis et al., supra note 106, at 1540 (stating that, as stocking density increases, chicken welfare decreases).

seek to influence in-state and out-of-state producers in the same manner and to the same degree. As such, the integrity of interstate commerce remains intact, and the livelihood of conventional broiler chickens vastly improves.

This proposal improves animal welfare, reduces environmental risks, and protects a valuable consumer base from potential health risks. Thus, the amendments are consistent with case precedent as a valid constitutional exercise of Ohio's police powers. As Justice Brandeis once stated: "It is one of the happy incidents of the federal system that a single courageous State may, if its citizens choose, serve as a laboratory; and try novel social and economic experiments without risk to the rest of the country." The Ohio sales ban would embody the honorable Justice's statement for federalism. Acting within the powers granted by the Constitution, Ohio's proposal would act as a novel approach to a longstanding problem of inhumane meat production. Improving animal welfare within the state, in a manner that does not hinder interstate commerce, provides a model for ethical meat production nationwide and upholds the goals of state sovereignty and power.

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^{282.} New State Ice Co. v. Liebmann, 285 U.S. 262, 311 (1932) (Brandeis, J., dissenting).

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[†] The author would like to express her sincere gratitude to Dr. Reed Loder for her advice and insight throughout the writing process. In addition, the author would like to thank Amanda E. Quinlan, Erin C. Bennett, Matthew Arnold, Sylvia Duluc-Silva, Kaelyn Barbour, Hannah Clarisse, Bomy Hwang, and Caitlyn Kelly for their diligent editorial work.