Ruling without rules: not only nudges.

Regulation beyond normativity

1. Introduction: can we rule behavior without specific rules?

Often, when a problem arises, someone immediately declares: "There's a regulatory gap to plug. What we need is a new rule." As if everything could be solved with a new regulation. And, when we think of a regulation that can fix things, generally what we have in mind is a verbal – and preferably written – regulation, such as an article contained in a code. Generally, we actually believe that human conduct

can be regulated almost wholly with the aid of verbal – language-based – regulations (see e.g. Bobbio 1950, 1958, and Ganz 1971).

These beliefs – whether implicit or explicit – in the field of normativity have resulted in a sort of "theory-induced blindness" (Kahneman 2011) that has prevented us from seeing and studying certain, different and significant, regulatory phenomena that form part of our daily lives. There are two aspects in particular that we wish to highlight here.

First of all, human behaviour can be regulated not only with verbal norms but also with non-verbal norms. A particularly interesting initial example here is graphical norms, like zoning maps or traffic signs.[1] Other examples are particular gestures (like a traffic policeman's gesture to stop), sounds (for instance, a referee's whistle during a football match), lights (such as traffic lights), material artifacts (a roundabout, for example) (Lorini and Moroni 2017).

To avoid misunderstandings, a clarification is necessary. Certain "individual norms" – such as the hand-signal to halt given by traffic police-officer – are usually based on more "general norms" (in this case, on the relative country's highway code). However, what we argue is this: the fact that individual norms are viable only in the framework of a more general system of norms does not imply that individual norms (including non-verbal ones) are not themselves norms; as such, these individual norms

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[1] Among the studies on this very challenging subject, see Gabellini (1996), Judge (2006), Monmonier (2010), Boehme-Neßler (2011), Miller (2013), Dudek (2015), Lorini (2015), Moroni and Lorini (2017), Lorini and Moroni (2020) and Maynard (2017).

(including non-verbal ones) can be distinguished from the general norms that make them possible (see Kelsen 1965: 355). In our view, the specific obligation to stop indicated for example by the red traffic-light at a given intersection in a given moment of time is an individual norm that acts apart from the overall rules laid down in the highway code which make it possible.

Secondly, behaviour may even be regulated without a specific rule. This article is devoted to this fascinating regulatory phenomenon. We shall call this phenomenon "ruling without rules" (i.e. "ruling without specific rules focused on the behaviour we want to influence", and *not* "ruling without any rule at all in place while trying to influence this behavior"). As we shall see, it overlaps only in part with the celebrated phenomenon of "nudging" (Thaler and Sunstein 2008).

Curiously, "ruling *without* rules" in certain cases turns out to be a more powerful, effective instrument for modifying behaviour than "ruling *with* rules". Indeed, ruling without rules may sometimes succeed in cases where ruling with rules fails.

It should be noted that ruling without rules is a form of ruling which, unlike ruling with verbal or graphical norms, can (and usually does) occur in a "hidden" fashion as a result of its structural characteristics. This makes it a powerful yet at the same time dangerous form of intervention, as it is not immediately recognisable and identifiable. In this case, it is difficult to identify the *stigma* of regulation. In this regard, it is essential to make it clear from the outset that this article does not set out to support this form of regulation in an indiscriminate, generalised way, but merely to

acknowledge and raise the issue of this important regulatory phenomenon and reconstruct the fundamental elements that characterise it.[2]

2. Examples: five cases of ruling without rules

In this section we distinguish among five different ways of ruling without rules: (i) ruling with adeontic artifacts; (ii) ruling through behaviour training; (iii) ruling by removing rules; (iv) ruling by providing an example; (v) ruling by mere presence.

2.1. First kind: ruling with adeontic artifacts

The first type of ruling without rules consists in "ruling with adeontic (i.e. non-deontic) artifacts"; that is, ruling with material artifacts which do not have a normative function as such. In our view, (regulative) adeontic artifacts thus differ from (regulative) deontic artifacts.[3] Deontic artifacts are material artifacts produced with

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[2] In other words, in this article we treat any example of ruling without rules in a neutral manner with respect to values, that is to say, in an axiologically neutral way. Here we analyse ruling without rules exclusively as a behaviour-modifying tool. Whether it is legitimate or not to use certain tools is a question that is posed at a different (ethical) level of the discussion.

[3] The adjective "deontic" (from the ancient Greek "*to déon*" meaning what is needful, binding) was used for the first time by Georg Henrik von Wright – on the suggestion of C.D. Broad – in his essay *Deontic Logic* to

an explicitly normative purpose. An example of a deontic artifact is a row of chairs placed by a waiter at the entrance to a room in a restaurant to block access to that room. The row of chairs has been placed there by the waiter with an explicit deontic intent. One could say that the row of chairs expresses the "prohibition of access to a specific room" or that it is in the row of chairs that the prohibition of access to a specific room consists. Further examples of deontic artifacts are a traffic light, a roundabout, normative road signs (a stop sign, for example) and normative road markings (for instance the centre line). Deontic artifacts by their very nature have their own *deontology*, in the specific sense in which the term is used by John Searle (1995 and 2010). In other words, deontic artifacts are characterised by a complex normative structure of obligations, rights, duties, penalties, permissions, etc., that is inseparable from their specific material structure. Consider a roundabout and the rules regarding giving way and the right to enter the roundabout that characterise it. If we are unable to understand what an obligation is, or what a right is, we cannot understand what a roundabout really is.

To conclude: Our distinction between deontic artifacts and adeontic artifacts concerns not so much the legitimacy of the artifact itself (e.g., whether or not it is

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denote the "deontic modes", i.e. the "modes of obligation" that are obligatory, permitted, forbidden, etc. (von Wright 1951). Von Wright distinguished deontic modes from alethic modes (i.e. modes of truth) and from epistemic modes (i.e. modes of knowing). The adjective "adeontic", with *alpha privativum*, is instead more recent: it was coined by Amedeo Giovanni Conte (1992).

backed by law),[4] as how such an artifact impinges on its context. In our view: (i) deontic artifacts influence the behaviors of agents by exercising a normative function (e.g., imposing a prohibition or an obligation), (ii) whereas adeontic artifacts condition behaviors in other ways (ruling out the deontological aspect, since they modify the behaviors of agents without applying prohibitions or obligations).

Our purpose in what follows is to examine the possibility of regulating human behavior by means of *adeontic artifacts*: that is, artifacts which are *not* intrinsically deontic. They have *not* been designed and made with an explicit *deontic intent*. Nevertheless, these adeontic artifacts have been designed and made in order to influence and modify human behaviour.[5] We must therefore distinguish "deontic" intent from "regulative" intent. Adeontic artifacts are artifacts that are devoid of any form of intrinsic *deontology* in Searle's sense.

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[4] There is no doubt that a deontic or adeontic artifact may be diversely applied according to the law or independently from the law (or even against the law), but this fact is irrelevant to whether an artifact is deontic or adeontic.

[5] The idea that behavior can be regulated by means of adeontic artifacts is in keeping with what American engineer and psychologist Donald Norman (1988 and 2013) has written with regard to how human behaviour is conditioned by means of *forcing functions*. Norman defines forcing functions as "the extreme case of strong constraints that can prevent inappropriate behavior". For example, "[s]tarting a car has a forcing function associated with it — the driver must have some physical object that signifies permission to use the car. In the past, it was a physical key to unlock the car doors and also to be placed into the ignition switch, which allowed the key to turn on the electrical system and, if rotated to its extreme position, to activate the engine" (Norman 2013, 141). Forcing functions are distinguished from the deontic functions insofar as they work on the basis of the mere physical structure of the artefact: they are mere brute, physical functions.

We shall now consider some examples of adeontic artifacts used to regulate. Of the many possible cases, we shall limit ourselves to eight examples which we find particularly interesting for our basic argument.[6]

An initial example is constituted by the *sleeping policeman*; that is, a speed bump to slow traffic (Salau et al. 2004).[7] Some have referred in this case to the existence of a "tactile stimulus" (Dixon and Jacko 1998). It should be noted that a sleeping policeman does not signal a precise speed limit. All it does is "hamper" the transit of a vehicle, "persuading" it to slow down. It is important to underscore the fact that the sleeping policeman may perform its function on its own, that is to say, in the absence of speed limit signs – and even in the absence of a highway code. As Mattias Kärrholm (2007, 445) writes, a sleeping policeman "tends to produce a lot of cars driving slowly, regardless of speed limits, road signs, or rules". The peculiar nature of the sleeping policeman is also shown indirectly by the idea of harnessing the kinetic energy

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[6] Our focus here is on the human world. Other significant phenomena also exist in the animal kingdom. A case in point is the silhouettes of birds of prey on temporary transparent surfaces (on building sites, for instance) or permanent ones (on houses or at the sides of roads), to prevent birds from hitting glass (Schmid et al. 2013), or scarecrows used to keep birds away, for example, from crop fields (Lorimer, 2013). Reflections on the effectiveness of scarecrows and other devices to scare birds away (Marsh et al. 1991, 1992; Bishop et al. 2003; Bateson et al. 2006; Ainsley and Kosoy 2015), assume new interest from our perspective.

[7] Speed bumps have attracted the attention of several scholars in the field of social and human sciences. See Knappett (2002), Dant (2004), Latour (2005), Witte and Haas (2005), Verbeek (2006), Pols (2013), Ribes et al. (2013), Hartswood et al. (2014), Lorini (2015).

produced by the impact of vehicles with it in order to produce electricity (Ramadan et al. 2015).

A second example is represented by the introduction of suitably placed objects (for instance, pillars) at exits from places in which large flows of people usually leave (such as sports stadiums). In an apparently counterintuitive way, it has been shown that adequately restricting the exit opening may facilitate and speed up the flow of people away from the building. As Jiang et al. (2014, 2) write in an interesting study on this matter, design can either hamper or facilitate the escape process, particularly in panic situations: "the literature indicates that it is possible to increase the outflow by suitably placing an obstacle". Their simulation results indicate "that appropriately placing two pillars on both sides but not in front of the door can maximize the escape efficiency" (Jiang et al. 2014, 2).[8]

A third example is the silhouettes used along roads – for example certain highways in France and Italy – to prompt motorists to drive carefully. They are usually in the shape of a person, generally black in colour, positioned at the roadside on particularly hazardous stretches. They mark the place where someone has lost their life in a road accident, or the number of fatal accidents on that particular stretch. They have been termed "*rue de la morte* signs" (Tromp et al. 2011, 10).

A fourth example is represented by trash cans designed to reduce littering (de Kort et al. 2008). Garbage cans have for instance been designed in certain places as baskets used in games to score, giving a different meaning to the action itself of throwing

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[8] For other studies on this kind of issue see also Jia et al. (2017) and Zhao et al. (2017).

garbage in them (Tromp et al. 2011). A similar phenomenon is constituted by the *GnamGnams* at Leolandia (a theme park for children in Italy). The *GnamGnams* are funny characters, "greedy for waste", designed to engage children in proper recycling by "playing" with colors and noises. The yellow *GnamGnam* for instance loves to eat plastic bottles, making a strange and amusing noise: "crwaaash". These two examples show how the playfulness of human beings can also be exploited in order to rule without rules.

A fifth example is that of kitchens designed in a way that promotes calorie-aware cooking. As Pei-Yu Chi et al. (2008, 117) write in a study on this matter, the *Calorie-aware Kitchen* "is augmented with sensors that track the food ingredients used during cooking, and provides just-in-time digital feedback to raise healthy cooking awareness". An initial prototype of this kind of kitchen was proposed, and comprised two modules: (i) "a calorie tracker that tracks the calorie, composition, and position of food ingredients currently on the kitchen counter or stove", and (ii) "an awareness display that provides calorie information on the ingredients and dishes that mirror actual layout" (Chi et al. 2008, 118). A similar direction has been taken by food containers (currently available on the market, such as the *Kitchen Safe*), the opening of which can be set with a timer. The aim is to help users during dieting periods, inhibiting them for instance from grabbing whatever food they have in their larder.

A sixth example is provided by the use of devices producing a specific kind of blue lighting in certain spaces – for example toilets – to discourage drug addicts from

injecting due to the fact that veins are difficult to see in such lighting conditions (Lockton et al. 2010a).

A seventh example – albeit in this case one which is open to criticism in several respects – comes in the form of so-called *hostile architecture*, also known as *disciplinary architecture* or *defensive architecture*.[9] These expressions refer to physical devices which are ever more frequently installed in today's cities to prevent, for instance, homeless people from dwelling or sleeping in certain places.[10] Examples are benches with metal dividers – or with an uneven surface – that are unusable for any purpose other than sitting (in short, they are "sleep-prevention benches": Rosenberger 2014) or metal studs implanted in the ground in order to discourage people from dwelling there (also called "anti-homeless spikes": de Fine Licht 2017). Robert Rosenberger (2017) calls them "callous objects".

An eighth case, in a sense the opposite of the previous one, is represented by forms of *inclusive architecture*, which contributes to a convivial experience of the city by materially accommodating, for instance in public squares, various kinds of activities and users. An example is for instance General Gordon Square in London (see Bates 2018).

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[9] The regulatory and "quasi-policing" nature of the artifacts of hostile architecture has been well captured by the German photographer Julius-Christian Schreiner, who has collected a series of images of cities' hostile installations under the name of "silent agents" (see https://www.juliuscschreiner.com/silent-agents; accessed December 2019).

[10] See on this Yeung (2015), Petty (2016), de Fine Licht (2017), Johnsen et al. (2018), Stevens (2017), Rosenberg (2017 and 2019), Smith and Walters (2018), Chellew (2019).

It might be observed, in conclusion, that architecture and design have always sought to influence behavior in some way. A specific type of floor tiling, for example, has often indicated areas for walking on and areas to avoid. A particular diffusion of light in certain cases has delineated areas in which to linger or not to linger, and so forth. For the purpose of our discussion, however, the most recent developments that fall under the label "persuasive design", and which openly and consciously seek to influence behaviour, are particularly interesting (de Kort et al. 2008; Lockton et al. 2010b, 2012; Tørning 2013; Shih 2016). As Yvonnne de Kort et al. (2008, 871) observe, "design is inherently persuasive, but the field is witnessing the emergence of a design emphasis on more deliberately persuasive objects".[11] Actually, persuasive design is defined as a form of design that has the explicit intent to change a person's attitude or behaviour. (Some of the examples referred to above have been devised specifically with this in mind, albeit without clearly distinguishing between deontic and adeontic artifacts as we suggest here.) The basic idea is that while the attempt to influence behavior through architecture and design used to be mainly based on common sense and intuition, today crucial support comes from the latest research in environmental and social psychology (de Kort et al. 2008).

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[11] A similar idea – the idea that it is possible to regulate by means of "physical designs" – is found also in Yeung (2012, 132): "The design of the physical environment, and the household products and artefacts that are employed by humans in their regular activities, can be designed in ways that will promote particular kinds of social outcomes."

2.2. Second kind: ruling through behaviour training

A second case of ruling without rules is "ruling through behaviour training". A clear example of behaviour training is animal training. Even when we attempt to get a bee to leave our house by seeking to usher it out of an open window, we are essentially implementing an extremely simple form of ruling without rules of this kind. We are in fact attempting to modify, without rules, the behaviour of an insect. We certainly could not get a bee to leave a room by ordering it to leave or by uttering threats. Naturally, there are also more complex cases of modification of animal behaviour, such as the domestication and training of riding or draught horses, the training of falcons in falconry and dogs that compete in dog agility events (McGreevy and Boakes 2011).[12] In all of these cases, the purpose of animal training is to regulate the behaviour of certain animals without recourse to rules as such and specifically without recourse to verbal norms.

Nevertheless, this form of ruling without rules regards not only non-human animals but also humans. There follows an example of human behaviour modification: "Francisco was gaining a lot of weight and decided to do something about it. He joined a weight loss group. At each group meeting, Francisco deposited a sum of money, set a goal for daily exercise, and earned points for meeting his exercise goals each week.

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[12] The American psychologist Burrhus Frederic Skinner (1960) taught pigeons to play table tennis, cats to play the piano and dogs to play hide and seek (Koren 2013).

If he earned a specified number of points, he got his deposit back. If he did not earn enough points, he lost part of his deposit money. Francisco began to exercise regularly and lost weight as a result of his participation in the group" (Miltenberger 2011, l).

Behaviour modification may take place through exposure to stimuli which may be of two types: reinforcements or punishments. More specifically, we can distinguish between four kinds of stimuli: (i) a positive reinforcement, (ii) a negative reinforcement, (iii) a positive punishment and (iv) a negative punishment. Firstly, there is a positive reinforcement when a behaviour is followed by a stimulus that increases occurrences of the behaviour in the future. Secondly, a negative reinforcement is obtained when a behaviour is followed by the removal of an aversive stimulus, which causes the occurrences of the behaviour to increase in the future (Miltenberger 2011, 93-95). Thirdly, we have a positive punishment when "the occurrence of a behavior is followed by the presentation of an aversive stimulus, and as a result, the behavior is less likely to occur in the future" (Miltenberger 2011, 105). Fourthly, we have a negative punishment when "the occurrence of a behavior is followed by the removal of a reinforcing stimulus, and as a result, the behavior is less likely to occur in the future" (Miltenberger 2011, 105).

This form of ruling without rules, that is, ruling through behaviour training, is exploited for example by the *Stickk.com* website (http://www.stickk.com) designed by Dean Karlan and Ian Ayres, two Yale University economists. The website is for people who need help in achieving their goals or aspirations, such as losing weight, or giving up smoking. It helps them to make a greater effort by providing a stimulus

which may be financial or nonfinancial. The online platform "invites users to publicly set a goal. It also provides the option to designate a set amount of money that the user will lose if he/she procrastinates" (Ozkaramanli et al., 2017, 231; see on this also Adams et al., 2014).

2.3. Third kind: ruling by removing rules

Another interesting, apparently paradoxical, example is provided by what we may call "ruling by removing rules"; that is, situations in which, by removing certain rules, a more adequately ordered situation is obtained. The best-known, most significant case is the removal of some road signs and road markings to increase drivers' responsibility. The basic idea is that excess road signage distracts the driver's attention from the road and other users, and creates a situation in which he/she feels justified in "offloading" his/her responsibility. In contrast, a reduction in signage impels drivers constantly to take other drivers and pedestrians directly and carefully into consideration.

Clearly, we are not suggesting that removing rules *always* engenders a desirable influence on behaviour; rather, that this may occur in certain situations, such as those relating to particular traffic situations. One of the first and best-known authors to recommend this strategy of removing rules in this field was the Dutch traffic engineer Hans Monderman. He introduced the idea of *shared space*; that is, a setting in which

clear demarcations between different flows (motor vehicles and pedestrians, for instance) are eliminated, and the constraints for each of these flows reduced, so as to encourage the various road users to behave with greater consideration for each other and also to acquire and use new skills and new sorts of expectations. As Ben Hamilton-Baillie (2008, 171) writes: freed from the traditional regulatory framework based on rights of way and traffic signals, "all the various participants in the constantly moving dynamic of the space appear to adopt a remarkable range of anticipatory and communication skills". The same point is stressed by Victoria Hammond and Charles Musselwhite (2013, 78): "In shared space, road user behaviour is controlled by interpersonal behaviour between street users, including non-verbal negotiation and social interaction".

One totally counterintuitive aspect of this approach is that even "ambiguity" (in designing intersections, for instance) is helpful in addressing traffic problems and increasing attention. As Ben Hamilton-Baillie (2004, 56) observes, in these cases "ambiguity and the need for reassurance through eye contact have replaced conventional traffic controls".

There follows an interesting observation by Monderman reported by Tom Vanderbilt (2008): "As I drove with Monderman through the northern Dutch province of Friesland several years ago, he repeatedly pointed out offending traffic signs. 'Do you really think that no one would perceive there is a bridge over there?' he might ask, about a sign warning that a bridge was ahead […]. He would follow with a characteristic maxim: 'When you treat people like idiots, they'll behave like idiots'".

Examples of Monderman's work are found, for example, in the villages or towns of Oudehaske, Wolvega, Oosterwolde and Drachten (in the Netherlands). They are generally crowded intersections where most of the traditional road signs and other traffic control devices situated there have been removed. What remains is a sort of shared square which forces car drivers, cyclists and pedestrians to assess individual situations with care. As Tom McNichol (2004) has written regarding one of the intersections on which Monderman has worked: "*The circle is remarkable for what it doesn't contain*: signs or signals telling drivers how fast to go, who has the right-of-way, or how to behave".

Attempts to apply Monderman's ideas are found in many other places in Europe, from the Swedish town of Norrköping to the German town of Bohmte (Vanderbilt 2008). Evaluations of Mondermanian solutions have shown a reduction in accidents and even of traffic congestion (Frosch et al. 2019).

2.4. Fourth kind: ruling through examples

A fourth kind of ruling without rules – and which certainly deserves more attention – consists in "ruling through examples"; that is, by acting in such a way as to provide others with a positive example. In this case, it is a mute, wordless form of regulation,

in which behaviour is influenced without laying down new rules (particularly verbal rules) but merely by example.[13]

An interesting phenomenon of this kind has been described by Giorgio Agamben (2013, 29). The Christian hermit Palamon, who lived in Egypt in the third century AD, told a monk from his community who asked him about how to behave with his disciples: "Be their example [*typos*], not their legislator [*nomothetēs*]." Agamben dwells at length on the distinction between *rule* and *form*, between *rule* and *example*, in the Christian monastic tradition, interpreted as two possible alternative forms of teaching and regulation of monastic behaviour. As he writes: "The logic of example is anything but simple and does not coincide with the application of a general law" (Agamben 2013: 95).[14] In this regard, Agamben (2013: 95) quotes also an exhortation of the Christian writer Sulpicius Severus: "*esto* […] *omnibus vivendi forma, esto exemplus*".

The positive role that example can play in the case of education – that is, being an example on the part of teachers or parents – is increasingly underlined (Chisiu 2013). The same happens with the idea of leading by example in organizations (Hermalin

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[13] The fundamental role played by example in Christian and Buddhist morality has been investigated and highlighted by the Polish legal philosopher Leon Petrażycki (1909-10), who interprets the example as a "normative fact", thus emphasizing the regulatory nature of exemplary action. He writes: "in Christian and Buddhist positive morality, not only the subjective moral sayings play the role of normative facts, but also the traditions of actions in different cases of the life of Christ, the apostles, saints, Buddha, etc., as models to be emulated" (Petrażycki, 1909-10, 614).

[14] Compare with Hazard (1981, 574-576).

1998; Schraeder et al. 2005; Nygaard et al. 2017). As Arne Nygaard et al. (2017, 138) write: "Leadership in the form of role models and good examples may be underestimated in organizational research. Our research shows that the power of a role model […] is the crucial instrument to create […] commitment and performance".

To conclude, as is often pointed out, "actions speak louder than words".

5. Fifth kind: ruling by mere presence

A fifth type of ruling without rules is "ruling by mere presence". A case in point is the activity of patrolling on the part of the police. The mere presence of the police may influence behaviour. It should be noted how often citizens ask the police not so much to intervene as to guarantee a constant presence in the city's neighbourhoods and streets to discourage criminal behaviour. This has been termed the "scarecrow function of the police" (Thomas 1945). It is interesting to observe that, in this case, police vehicles must be perfectly recognisable and/or police officers must be uniformed.

Obviously, we are not claiming that patrolling always obtains good results (as well known, there are several studies related to *how* it can be more effective, for example on foot or by car, targeted or non-targeted, etc.: see e.g. Tuffin et al. 2006; Ratcliffe et al. 2011). We are simply pointing out that it is a good example of an attempt to influence behavior without laying down rules.

3. Discussion

3.1. On the theoretical and practical relevance of "ruling without rules"

The five cases considered above represent an initial tentative taxonomy of the phenomenon of *ruling without rules*.[15] After discussing cases, however, it is essential to ask more explicitly *why* this phenomenon is important, both in theoretical and practical terms.

From a *theoretical perspective*, ruling without rules is certainly relevant to the theory of regulation (specifically it urges that we accept that it is possible to rule without rules, i.e. without normativity) and to the theory of social ordering (in this

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[15] Another intriguing case is what Grabosky (2016) terms "regulation by ridicule". He argues that ridicule can serve as a regulatory instrument. According to Grabosky (2016, 373): "ridicule has been an instrument of social control in a variety of disparate cultures, traditional and modern. In a more specific and more contemporary sense, it has also been employed as a means of influencing organizational behavior." Another phenomenon that perhaps deserves attention as a potential instrument for ruling without rules is "priming". As Kahneman (2011, 55) writes, "studies of priming effects have yielded discoveries that threaten our selfimage as conscious and autonomous authors of our judgments and our choices". Specifically, he mentions a study by Berger et al. (2008) on the vote held in 2000 to increase funding for schools in Arizona. In this study it is claimed that support for this additional funding was greater when the polling station was inside a school. On the effects of priming, see Bargh (2017).

case, it urges us to admit that the mechanism that generates social orders does not consist merely of rules, in particular verbal state-enforced rules).

From a *practical perspective*, it is particularly important for the theory of regulation insofar as it suggests alternative ways to influence behaviour in an effective manner. For example, it suggests a new approach in contrast to the traditional option of ruling exclusively by means of prescriptive rules (which need enforcement, and the violation of which must always be punished with a penalty). Indeed, some types of ruling without rules, as we have seen, actually prove to be more effective than forms of ruling with rules (e.g. verbal rules): take, for example, the case of the pillars opportunely placed at sports stadium exits to facilitate flows of spectators as they leave, or the behaviour training offered for users of the *Stickk.com* website wanting to give up smoking. It must be said that the point is not so much – or in any case not only – to avoid imposing a type of behaviour in a coercive manner as it is to obtain (without a specific rule) a better result; that is, a lower number of cases of behaviour that deviate from the model that one wishes to be followed. The attractive idea is that ruling without rules in certain cases might render *certain* rules superfluous and would maximise behaviour that conforms to the desired pattern. Naturally this can only be done for some situations, certainly not for all. For example, the approach may be

successful in avoiding certain prescriptive *regulative rules* – that is, certain rules which impose obligations or prohibitions – and certainly not for *constitutive rules*.[16]

In conclusion, it should be stressed that it is not only public authority that can make use of "ruling without rules". Anyone can do so (a trainer, a schoolteacher, an army officer, an engineer, an architect, etc.) even, paradoxically, in relation to him/herself: as in the case of the aforementioned food containers with timer locks or the Stickk.com website. What we have here is a case of self-regulation without rules, a case of "self-ruling without rules".

3.2. Desirable synergies and possible clashes between "ruling with rules" and "ruling without rules"

Of course, the two phenomena of "ruling (behaviour) with (specific) rules" and "ruling (behaviour) without (specific) rules" can overlap in certain cases, acting in synergy and reinforcing one another. A typical case is, for instance, the co-existence, on the same stretch of road, of a road sign indicating a speed limit of 30 kilometres an hour and a sleeping policeman that impedes the high-speed transit of vehicles. Yet it is only by clearly thematising *also* the phenomenon of ruling without rules that we

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[16] On the categorial distinction between *regulative rules* and *constitutive rules*, see in particular Znamierowski (1924), Rawls (1955), Searle (1969), Carcaterra (1974, 2014) and Conte (1988). For an overview of constitutive rules, see Żełaniec (2013).

can understand – and exploit – these phenomena of dual synergetic regulation. For the theory of law, this phenomenon is particularly important, as it shows how it is possible to use instruments which, although they may be very different, can be usefully combined with each other.[17]

Clearly the opposite may happen as well; that is, "ruling with rules" and "ruling without rules" clash with each other. An example is the conflict between constitutional laws that prohibit certain types of discrimination and certain examples of hostile architecture. Indeed, hostile architecture may be redefined as a form of design that explicitly and intentionally introduces discrimination – for instance, in the use of public spaces – only against certain categories of easily identifiable people. Here we might speak – introducing a totally new concept – of *unconstitutional objects* or *unconstitutional artifacts*. This case, too, is extremely interesting from the perspective of the theory of law, which has traditionally focused on analysing antinomies; that is, contradictions between different items of legislation and how to resolve them. In our case, we are dealing with a sort of *sui generis* antinomy which consists not so much in the contradiction between norms (and in particular between verbal norms, expressed in language) as in the contrast between two different forms of ruling: a "normative" regulation and another "non-normative" one. Unlike antinomies or contradictions between laws, such cases of inconsistencies can be more difficult to

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[17] An interesting experiment regarding the combination of "ruling with rules" and "ruling without rules" was conducted by Tiger and Hanley (2004).

identify and thus to deal with (in that there are no sentences that contradict each other).[18] This opens up a completely new field of study.

3.3. Similarities and dissimilarities with nudging

In all of our discussion, there are some evident points of contact with the concept of the *nudge* (Thaler and Sunstein 2008). Undoubtedly some examples considered to be nudges, such as the famous fake flies painted on the urinals of Schiphol airport in Amsterdam,[19] are also cases of ruling without rules. Nevertheless, the idea of "nudge" is in many ways different from the idea of "ruling without rules".

In our opinion, Thaler and Sunstein's original idea of nudge is too strict, since it excludes many interesting phenomena which are instead crucial for what we call "ruling without rules". For example, what we have termed "ruling by removing rules" certainly could not be classified as a nudge. The same applies to the phenomenon of

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[18] It is not only conflicts between "ruling with rules" and "ruling without rules" that are possible. So too are conflicts between two types of ruling without rules.

[19] In the men's rooms at Schiphol Airport "the authorities have etched the image of a black housefly into each urinal. It seems that men usually do not pay much attention to where they aim, which can create a bit of a mess, but if they see a target, attention and therefore accuracy are much increased. According to the man who came up with the idea, it works wonders. 'It improves the aim,' says Aad Kieboom. 'If a man sees a fly, he aims at it.' Kieboom, an economist, directs Schiphol's building expansion. His staff conducted fly-in-urinal trials and found that etchings reduce spillage by 80 percent." (Thaler and Sunstein 2008: 3-4).

"ruling by mere presence", and to some of the cases that we have discussed under the label "ruling through adeontic artifacts"; as correctly stated by Ryan Calo (2014), devices like speed bumps, for instance, cannot be considered in any sense nudges.

The point is that the term "nudge" suggests that, instead of coercing a person, one may (only) "push" him/her (in a gentle manner), by taking advantage of certain human cognitive biases.[20] This in some way restricts the range of relevant phenomena (in comparison with what we call "ruling without rules"); that is, it focuses on "pushing" someone in some direction and mainly through exploiting his/her biases. Moreover, due to the term "nudge", and how the issue is framed by certain nudge theorists, the attention can slide imperceptibly and inadvertently also to (*prima facie* excluded) normative phenomena.[21] This sometimes happens because the difference between deontic and adeontic artifacts presented earlier is not usually acknowledged.

On the other hand, and at the same time, the notion of nudge is too broad. Indeed, Thaler and Sunstein (2008, 10) also spoke of "unintentional nudges". They explicitly

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[20] According to Thaler and Sunstein, "nudges are changes in the decision-making context that work with cognitive biases" (Selinger and Whyte, 2011: 925).

[21] As observed by Hausman and Welch (2010, 125), an "egregious example of mislabeling a coercive policy as a nudge" appears when Thaler and Sunstein (2008, 186) note that a cap-and-trade system for reducing pollution "is compatible with libertarian paternalism because people can avoid paying the tax by not creating pollution". The same happens with other normative phenomena, such as the "Look right!" road marking found in the United Kingdom for foreign pedestrians crossing the road, which is often included in the category of nudging (Thaler and Sunstein, 2008, 90; Thaler et al., 2013, 433). To conclude, as Hill (2018, 1291) observes: "There is a fair bit of theoretical confusion in the nudge literature on what, exactly, constitutes coercion".

write: "It is true, of course, that some nudges are unintentional" (Thaler e Sunstein 2008, 10). In this regard, nudging is clearly different from our idea of "ruling without rules", which is always, by definition, intentional. Specific cases of unintentional nudges are those that Thaler and Sunstein call "social nudges". Social nudges differ from ruling without rules not only because the former are unintentional, but also because certain "social nudges" are deontic phenomena in themselves: they have normative power (see also Czajkowski et al. 2019, who, referring to Thaler and Sunstein, speak of "social norm nudging"). In this sense they seem to be related to those phenomena which Émile Durkheim (1895) calls "social facts" endowed with normative and coercive power.

4. Conclusion: the sphere of regulation is broader than that of normativity

The main conclusion to draw from our discussion on "ruling without rules" is that the field of *regulation* is broader than the field of *normativity*. Regulation can be achieved not only with norms but in many other ways (Krecht 1986).

This is an extremely important point for the theory of law and regulation since, as we have seen, it paves the way for innovative forms of intervention which do not require (the creation of new) norms.

Moreover, ruling without rules is not only a kind of regulation "without normativity": it is also a kind of a regulation "without deontology" in Searle's sense.

It is a form of regulation which does not even require deontic categories, generally considered indispensable to the existence of law, such as obligations, bans, rights, commitments, responsibilities, duties, privileges, entitlements, penalties, authorizations, permissions, etc. Observe how ruling without rules, unlike ruling with rules, would be possible not only in a hypothetical *a-nomic world* (i.e. a world without norms, in ancient Greek "*nómoi*"), but, also, in a hypothetical *a-deontic world* (i.e. a world in which deontic entities like obligations, rights, commitments, claims, etc. do not exist).

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