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Privacy politics: Power relations in the extraction, management, and use of personal data by non-state actors

PRIVACY POLITICS: POWER RELATIONS IN THE EXTRACTION, MANAGEMENT, AND USE OF PERSONAL DATA BY NON-STATE ACTORS

The extraction, management, and use of personal data are the subjects of a wide range of research, in different disciplines and with both empirical and normative analytical perspectives. The focus usually tends to be on the analysis of particular personal data-related conditions of individuals (and relative breaches), such as respect for or violation of privacy, or macro-processes related to surveillance by States or non-state actors. The aim of this article, on the contrary, is to answer the following research question: what power relations underlie the extraction, management, and use of personal data by non-state actors? For the purpose of this article, I employ a simplified information lifecycle model to keep personal data analytically distinct from the resources required to acquire, manage, or use it as a social resource. Furthermore, I use the concepts of solitude, intimacy and anonymity in place of the concept of privacy, to identify the different conditions on the basis of personal data-related relations between actors. The objective is to provide a theoretical framework capable of analysing existing power relationships between individuals and non-state actors related to personal data, which can be used both for normative political theory analysis (for example to understand what actions political power can take to rebalance power relations in the political arena) and empirical study of existing rights.

KEYWORDS *Power, Political Power, Privacy, Personal Data, Non-State Actors.*

1. Introduction

Non-state actors¹ play a prominent role in the evolution of ICTs and the techniques for their use: indeed, the cooperative and conflictual relations (Calderaro and Marzouki 2022; Egloff 2022) between States and non-state

¹ In this article, I refer to «non-state actors» relying on a slight modification of that offered by (Josselin and Wallace 2001, 2-4). They define non-state actors as organizations:

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actors underpin the structuring of cyberspace. In this environment, unorganised individual actors are the object of unbalanced power relations pertaining to their personal data (West 2019), coming either from non-state actors, States or from the combined actions of these two types of actors.

The extraction, management, and use of personal data are the subjects of a wide range of research, in different disciplines and with both empirical and normative analytical perspectives. However, the focus usually tends to be on the analysis of particular personal data-related conditions of individuals (and relative breaches), such as respect for or violation of privacy, or macro-processes related to surveillance by States or non-state actors (Kitchin 2021; Zuboff 2019).

Considering the prominent role of non-state actors, this article aims to develop a theoretical framework for the study of power relations exercised by non-state actors toward individuals, pertaining to the personal data of the latter.

Since the actions underlying these relations necessarily take place within political arenas, it is necessary to consider political production by States. The latter, however, produce policies in a scenario where some non-state actors have the capacity to transcend policy boundaries in different ways (Bartolini 2005). For this reason, and to avoid falling into the trap of technological determinism (Dafoe 2015), the theoretical framework adopts the strategy of considering the interactive mechanisms within the different political arenas, focusing on the study of the domain, the resources present there, and the actors controlling (or aiming to control) them, and the relationships linking these three elements. Consequently, this article develops from the framework of the general theory of politics by Stoppino (2001). In this way, it is possible to frame data-related relations within the framework of constraints and opportunities provided by the political structure (i.e. the framework of powers – political and social – stabilised in society), while also taking into account that these relations can also modify this structure (when they permanently impact on the power structures within society). Within this framework of stabilised constraints, political production can also vary, depending on the relative capacity of organised actors and individuals. Political authority, in fact, «produces binding networks or orders of guaranteed powers (and conformity), i.e. of rights, which are instrumental goods that stabilise and protect the acquisition of final goods²,

«Largely or entirely autonomous from central government funding and control [...]; acting in ways which affect political outcomes[...]; operating as or participating in networks that extend across the boundaries of two or more states [...]».

For this article, I do not consider the last condition as essential, but as possible, to include non-state actors operating only within the territory of a single State.

² By «final goods» are meant «well-being, social-ethical identity, physical integrity» understood as products of the economic, symbolic and coercive powers» (Stoppino

for the social field of reference» (Stoppino 2001, 292)³. Social relations can be considered as a process of negotiation-bargaining between social actors that does not imply a direct intervention of the actor holding political power but can invoke it, either through direct demands by the actors themselves involved in the relations, or indirectly (leading, for example, to political production to protect individuals or enterprises, rebalancing existing relations between them, or acting to protect both against malicious actors).

In order to ensure the greatest possible generalisation, and to have clearly distinctive and defined analytical categories, instead of the concept of privacy – or other concepts with contested definitions that vary according to the legal and cultural context – I use the concepts of solitude, intimacy and anonymity (Bocchiola 2014). These concepts are in fact capable of defining the different configurations of the relationships between actors related to the personal data underlying the conditions per se, bringing together data flows with the levels on which they insist (individual, relational or public, respectively).

To provide a model which brings together, but keeps analytically distinct, the dynamics underlying the retrieval of resources and the exercise of power based on information resources, I realise a simplified version of an information lifecycle concerning personal data. The latter is a model for exemplifying the sequence of actions (and related phases) required to transform the observed properties of objects or events into usable information-based artefacts.

Thus, considering that the power relations at the basis of the personal data-related relations between actors can be framed by the different networks of rights (both for individuals and non-state actors) and the resulting opportunities and constraints, I develop this article answering the following research question: what power relations underlie the extraction, management, and use of personal data by non-state actors?

The objective of this paper is to provide a theoretical framework that can be used both for normative political theory analysis (for example to understand what actions political power can take to rebalance power relations in the political arena) and for empirical study of existing rights.

The paper is divided into five parts. After the introduction, in the second part, I present the fundamental concepts of personal data, the simplified version of a personal data lifecycle, and the concepts of solitude, intimacy and anonymity. In the third part, I frame that lifecycle in Stoppino's framework, describing the different social resources needed in each phase, particularly focusing on the actions connected to power relations. In the fourth part, I

2001, 163-166). I provide a more detailed discussion in the third section.

³ All quotes and terms used in Stoppino (2001) are translated into English directly by the author, unless otherwise indicated.

classify, through Stoppino's formal classification (Stoppino 2007), the main power relations underlying the different conditions of solitude, intimacy, and anonymity. In conclusion, in addition to resuming the theoretical framework, I provide an outline of its utility and applicability.

2. Information lifecycles and personal data

As Kitchin (2021, 3) points out, «data are commonly understood as measures of the world and the building blocks from which information, knowledge and value are produced». The literature that mainly carries this vision forward is that concerning the Dikw hierarchy⁴ (Rowley 2007), in which an original contribution is that provided by Ackoff (1989, 3), who defines data as «symbols that represent properties of objects, events and their environment», «[...] products of observation». In addition to critical positions towards Dikw literature, mainly regarding the definition of mechanisms of passage between the various states of data, information, knowledge and wisdom, as well as the definitions of the stages (Frické 2018), another relevant data-based definition of information is provided by Floridi (2010, 21) in his discussion of the General definition of information (Gdi). The definition of Gdi is: «is an instance of information, understood as semantic content if and only if: Gdi.1) a consists of n data, for $n > 1$; Gdi.2) the data are well formed; Gdi.3) the well-formed data are meaningful». For «meaningful», Floridi (2010, 21) means that data which «must comply with the meanings (semantics) of the chosen system, code, or language in question». Furthermore, the generation and use of protocols, scales of measurement, standards, visualization or presentation techniques (Dalton and Thatcher 2014; L. Taylor 2015) and, even more so, indicators (Giannone 2019) may in fact subtend different kinds of power relations.

Considering those elements, I mean data as those symbolical representations, albeit not raw and carrying multiple elements given by the factual knowledge and value beliefs of the observer, of objects or events, still not framed in accordance with the semantics of a system. Consequently, for information, I mean those data which are already meaningful and well-formed. I call information-based artefacts the products whose content is made up of data

⁴ Dikw hierarchy literature depicts the key common elements (data, information, knowledge, and wisdom), in this order, explaining the «higher elements in the hierarchy [...] in terms of the lower by identifying and appropriate transformation process». The consequent «implicit challenge is to understand and explain how data is transformed into information, information is transformed into knowledge, and knowledge is transformed into wisdom» (Rowley 2007, 168).

and information (Kallinikos 2010). The definition of personal data tends to be framed – sometimes in a complex and uncertain way – in relation to the various legal traditions of different institutional frameworks (Millard and Hon 2012; Schwartz 2004). For this reason, to make the framework of the article as generalizable as possible, the definition of personal data that I intend to use in this article is a declination of what I use for data, in which the «objects or events» are declined as: individuals, their actions and their relationships. The use of such a broad definition can be considered a partial limitation of this study, since it is blurred with respect to the nature of the objects. Nevertheless, it does provide sufficient conceptual delimitation, when put in combination with the different conditions of personal-data related relations between individuals given that the focus of the paper is the analysis of the relationships pertaining to data and information and not on the standalone nature of the objects themselves.

To deconstruct the power relations underlying the black-boxed processes for the retrieval and use of information-based artefacts, it is necessary to analyze the succession of phases through which such an artefact becomes a resource that can be used by a final user. For this purpose, I employ a simplified information lifecycle model. Data and information lifecycle models are usually used to describe personal (Williams *et al.* 2009) or general information management processes (Detlor 2010), to analyze values, risks and costs in corporate governance of big data (Tallon 2013), value-added processes in information systems (R. S. Taylor 2007), big data management for data-driven governments (Shah *et al.* 2021), to provide a general framework for security risk assessment (Bernard 2007), to give suggestions for the development and management storage environments (Tallon and Scannell 2007). This literature points out three different classes of processes: processes that concern the execution of actions aimed at making data and information available and usable; processes that concern the planning and governance of the information lifecycle or its phases or sub-phases (so-called Data or Information management planning – Dmp/Imp); and social and political macro-processes, which influence the relationships within and between the two previous classes of processes. The focus of this paper is on the first type of process, to provide tools for the development of meso-level theories, capable of connecting the micro to the macro level, framing meso-theory within organizations theory and a general theory of politics.

In Fig.1 the different phases found in the cited literature are grouped in macro-phases, mainly drawing from the Floridi's (2010) model (occurrence, transmission, processing and management, usage). Since the model I want to realize aims to analyze relations between actors, I unpack the transmission

phase in the transferring actions between phases. Furthermore, I distinguish between two different initial phases of the lifecycle: extraction, in cases where the data constitutes an observer's representation of facts or events; creation, in cases where the actor responsible for the first phase of the cycle hinges its action on creativity. This distinction, however, retains limitations due to an ideal-typical representation: in fact, an observer who extracts data from an object or event is influenced by the environment in which she operates, by her factual knowledge and value beliefs and can use a certain amount of creativity both when the purpose of the lifecycle is to create information or disinformation; a creator is supposed to produce information-based artifacts with original content, but that content can be inspired or reflect to some amount the representation of reality. Moreover, some actions are placed in more phases, like «collection». It means that the framing of the particular action in a phase or another depends on its operative realisation: collection is in the extraction phase when it is understood to mean observation; when collection is used to mean some kind of – direct or indirect – retrieval of existing information controlled by other actors, it is a combination of transmission and management phases.

Creation	Extraction	Management	Use	Transmission	DMP / IMP
creation	discovery	collecting	monitoring	networking	quality
authorship	collection	validating	modeling	distribution	storage
design	acquisition	modifying	analysing	access	security
		organising	explaining	retrieval	protection
		indexing	planning	transmission	access
		classifying	forecasting		planning
		filtering	decision making		governance
		updating	instructing		
		sorting	educating		
		storage	learning		
		preparing	share/publish		
		analysing	(re)use		
		end of life	feedback		
		access	visualization		
		archive	distribution		
		select	display		
		acquire	interpret		
		retrieve			
		reception			
		maintenance			
		disposition			
		destruction			

FIG. 1. Information lifecycle synthesis based on the grouping of phases found in the literature.

Source: own elaboration.

Consequently, the simplified version of the information lifecycle of this article is made up of three phases: creation or extraction, management and use. In particular, there could be two different models of information lifecycle: (G) Emu – (Generation of properties of objects or events), Extraction (of data), management, use; Cmu – Creation (of data), management, use.

Since in this article I focus on a particular information resource, i.e. personal data, I use this model to analyse personal data-related relations between actors. Consequently, the main related concepts to consider should be those of privacy for its almost worldwide recognition and personal data protection, mostly regarding the Eu tradition, which has become an international benchmark (Banisar and Davies 1999). However, rights concerning individuals' personal data differ in the various States, due to several factors. In order to offer a general framework, I adopt the strategy of relying on a classification of personal data-related relations distinguishing and conceptualising them on the basis of an interrelationship between different dimensions.

Thus, I employ the concepts of solitude, intimacy and anonymity in place of the concept of privacy, adapting a framework by Bocchiola (2014) from the ethical-political literature. He starts from the literature that «interprets the concept of privacy as the composition of three concepts: solitude, intimacy and anonymity» (Allen 1988; Gavison 1980; Westin 1967). He criticise the absence of the identification of «characteristics or properties present in all three components, so as to be able to delineate the general and all-encompassing concept of privacy» (Bocchiola 2014, 150). Consequently, the definition of the three distinct concepts is built on four interrelated analytical dimensions: the condition «indicates the temporary state or situation in which an individual is in relation to other persons, in order to achieve a certain object»; the object «is something good or right/fair or desirable»; the instrument is «the way in which each concept realises the condition it defines»; the level is «the scope of application of a concept» (Bocchiola 2014, 138-139). These dimensions are related to each other, through several steps: «the condition and the instrument of realisation together determine the level of application and, thus, also the type of realised object» (Bocchiola 2014, 139).

TAB. 1. *Summary scheme of the conditions of solitude, intimacy and anonymity*

Condition	Instrument	Level	Object
Solitude	Separation	Individual	Moral
Intimacy	Confidentiality	Relational	Social
Anonymity	Indifference	Public	Political

Source: Bocchiola (2014, 148).

3. The simplified information lifecycle model for the analysis of power

The conditions of solitude, intimacy and anonymity are underpinned by power relations between individuals who want those particular conditions guaranteed and external actors who want to obtain, manage, and use their personal data. In these relations, individuals and external actors may interface by adopting different strategic behaviors, oscillating between cooperation and conflict, further influenced by the distribution of social resources available to them, which may configure relationships of exchange or domination. For the analysis of those relations, I rely on the theoretical framework of power given by the general theory of political power by Stoppino (2001). He defines power as «any relationship of intentional or interested social causation» (Stoppino 2001, 133). The social characterization of causation «denotes a relationship between actors (individuals or groups) who are different from each other; or, rather, a relationship between behaviors or between dispositions to act of different actors» (*ibidem*). The relationship of social causation can be actual or potential, «since it is power both to determine the behavior of others and the capacity to determine it» (*ibidem*). The second part of the definition concerns the intentional or interested characterization of social causation: «this requirement is valid for excluding from the field of power all those causal relations in which B's behavior x, although caused by A's behavior x, is nevertheless contrary to A's intention or interest, i.e. indifferent to A. To exercise power is to obtain cooperation, i.e. to obtain behavior in conformity with our intention or interest» (Stoppino 2001, 134).

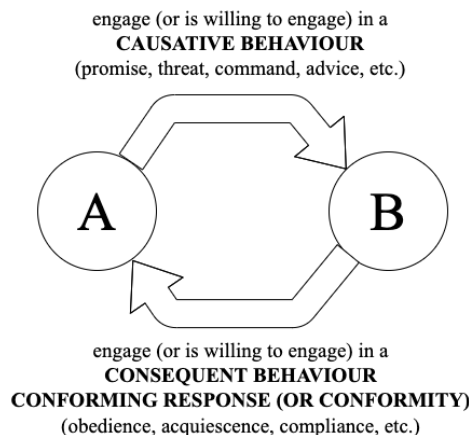


FIG. 2. Basic elements of a power relation.
Source: Stoppino (2001, 133-135).

The ordinary social action at the basis of a power relation (diagram S in Fig. 3) can be described as follows: «in order to achieve the things they want (the final values), [...] they must obtain the cooperation (and thus the conformity) of other actors, and to obtain this cooperation, they must use part of their social resources for this purpose, either to remunerate or to persuade or to coerce» (Stoppino 2001, 229). In this case, conformity remains a mean and the scenario is characterised by «an uninterrupted process of bargaining and conflict»: in fact, it is sufficient «that an actor produces, invents or provides itself with a greater quantity of a resource, or that it introduces a new and more efficient way of combining different resources, or that it improves the techniques of resource use, for the actor to rationally seek to modify the reason for exchange in its favor, believing that that improvement in the actors' 'balance of strategic resource power' must produce a corresponding improvement in the ratio of final values to resources supplied in power relations with other actors» (Stoppino 2001, 230-231). Political action «breaks the exercise of power that from A, through R and C, arrives at the V values, and stops at C (conformity), because it seeks to stabilise and eventually [...] generalise conformity» (Stoppino 2001, 234). Consequently, «on the one hand, there is always [...] the desire to obtain final values, but, on the other hand, these values, both in terms of benefits and in terms of security, can only be stabilised, made secure, protected and generalised towards a plurality of actors, if conformity is guaranteed as such» (*ibidem*).

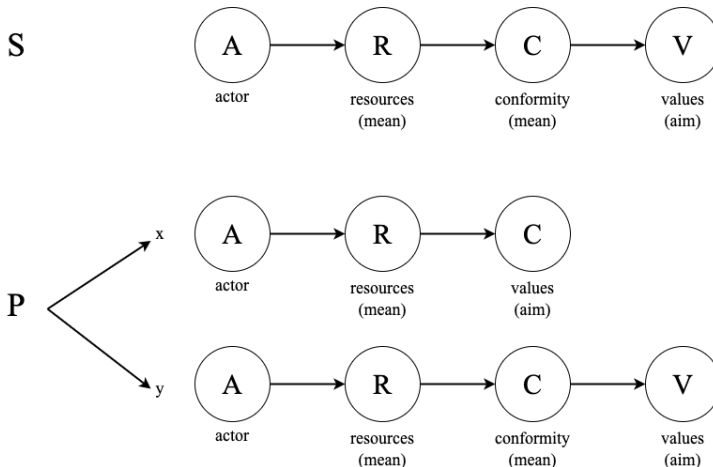


FIG. 3. Social action and political action diagrams.
 Source: for the action aimed at producing final goods diagram, Stoppino (2001, 229), for the political action diagram (Stoppino 2001, 234).

The purpose of political action (diagram P in Fig.3) is thus summed up in the quest for guaranteed conformity (or guaranteed power), where «guaranteed stands for stabilised and generalised» over time and over «all of the actors belonging to the social field of reference» (Stoppino 2001, 235-237). In particular, within the political arena of competence, political power «produces networks or binding orders of guaranteed powers (and conformity), i.e. of rights, which are instrumental goods that stabilise and protect the acquisition of final goods, for the social field of reference» (Stoppino 2001, 297).

Applying this framework to the analysis of a simplified information lifecycle model, we can identify both the social resources assigned to each phase and the overall resources used in all phases, to analyze the concentration of resources and phases, focusing on the connected actors, behaviors and aims. Every phase has its typical resources: extraction or creation need productive and poietic resources, in order to create data through observation or generate data out of the individual imagination; management phase needs further productive (meant here as capable of manipulating data and information), maintaining and processing resources; use is the phase in which the finished informative resource is then exploited.

Tab. 2. *Simplified information lifecycle's characteristics*

Phase	Extraction or Creation	Management	Use
Resources connotation	productive and poietic	productive, maintaining and processing	informative resources
Resources	observers, creators sensors, transcription instruments techniques of observation, artistic techniques	analysts, archivists, maintainers archives, space, printing technologies, storage technologies techniques of archiving, manage, modify, etc. data and information	decision-makers, planners, instructors, publishers communication infrastructures and devices, printed artefacts, code techniques of usage
Role of data and information	data being formed factual knowledge of the actor, coming from previous existing information lifecycles	well-formed data information	ready-to-use information-based artefact
Aim of the phase	existence of data	consistency and usability of data	various aims of the actor controlling the information-based artefact

Source: own elaboration.

4. Solitude, intimacy and anonymity: from conditions to rights

The conditions of solitude, intimacy and anonymity are guaranteed by operative instruments: in the power relations underlying the conditions, these instruments are nothing more than a macro-category of the objects on which a power relation insists, employed by the actor who wants to obtain the various conditions. The actor who engages in causative behavior needs to act to obtain the desired condition, through obtaining the conformity of external actors: the mere fact that there are actions, in fact, does not imply that these actions underlie power relations. For example, if I were to live indoors, with the shutters closed, without any kind of contact with outside society, it would not mean that I was limiting observation by outsiders: they might – trivially – not be interested in observing me. Those three conditions require the causative behavior consisting of non-actions. For instance, this would happen if I were to close the shutters while my curious neighbour observes what I am doing in the house, causing an interruption in her observation. The way in which this outcome is controlled, as well as the actor in charge of this, is crucial. On the contrary, violations of the conditions have the sufficient character in that the mere violation of one of the relations of the conditions permits a certain degree of violation of the conditions. A final preliminary point concerns the fact that mere observation does not constitute an exercise of power when it does not cause an alteration in the behavior of others: it is an action of resource extraction for further use in the future, even if directed towards the same individual. For example, if I were to observe my neighbour while he walks down the street, I would not be automatically exercising power.

At this stage, it is possible to proceed to the development of a theoretical framework capable of identifying the main power relations underlying the different conditions of solitude, intimacy, and anonymity, classifying them using Stoppino's formal classification of power. The latter concerns «the forms of power relations», i.e. «the modalities or [...] the procedural dimensions of power relations» (Stoppino 2001, 135). This classification is made through the use of three classificatory criteria. The first criterion concerns the distinction between open and hidden power: hidden power is defined as «any power relationship in which, on the one hand, A seeks to hide from B its exercise of power (or the nature of its exercise of power) and, on the other hand, B remains effectively unaware that it is subject to A's power (or the nature of its power)» (Stoppino 2001, 136-138); with regard to open power, the absence of both requirements make it explicitly open, and «the key point» lies in «the absence of A's deliberate intention to keep its exercise of power (or the nature of that

power) hidden» (*ibidem*). The second criterion concerns the specific object on which A intervenes to exercise power on B, altering B's «alternatives of behaviour»: «forms of power that intervene on B's open 'factual knowledge and value beliefs' (i.e. on the subjective conditions that shape the alternatives of behaviour in a more or less conscious manner), forms of power that intervene on B's 'unconscious psychological processes' (i.e. on the subjective conditions that shape B's alternatives of behaviour by means of unconscious processes), and forms of power that operate on B's 'social environment' (i.e. on the objective external conditions that contribute to shaping B's factual knowledge and value beliefs and, by this route, her alternatives of behaviour)» (*ibidem*). The third classificatory criterion concerns «the subjective dimension of A's intervention, i.e. the orientation of meaning that accompanies the behaviour of the actor exercising power; and it allows us to discriminate, in an open field of power, the 'intentional' forms of power from those that are merely 'interested'» (*ibidem*). Consequently, manipulation is characterised by the fact that in relation to the third criterion it can only be intentional power and, in relation to the second criterion, does not offer the possibility of alternatives of behaviour. Open power, on the other hand, makes it possible to distinguish internally between intentional power and affected power but, in relation to the second criterion, does not present the possibility of intervention in the object of unconscious psychological processes, due to its open nature (*ibidem*).

Tab. 3. *The formal classification of power by Mario Stoppino*

		Second criterion					
First criterion	Hidden power	Social environment	Unconscious psychological processes	Factual knowledge and value beliefs	Available alternatives	Intentional power	Third criterion
		Situational manipulation	Psychological manipulation	Informational manipulation			
	Open power	Conditioning		Persuasion	Remuneration Constriction	Merely Interested power	
		Interested conditioning		Imitation	Anticipated reactions		

Source: Elaboration based on the two tables of the formal classification of power by Stoppino (2001, 148-149); for the English terms, the English translation of the essay on which the same chapter was based (Stoppino 2007).

For simplicity of analysis, the relationships set out below are those between individual actors (A or B) and non-state actors (C), without considering - at least initially - the intervention of the political authority. After defining the possible set of relations for each condition, in the last part of this section, I introduce the framework of rights and the role of political power.

Solitude is the «condition of total absence of access or control, direct or indirect, over an individual by anyone» (Bocchiola 2014, 139). In particular, it is a «state of voluntary and positive separation that each individual seeks, for example, to reflect calmly and detachedly before making an important decision, or at times when one wants to give vent to the most singular inclinations without being observed» (Bocchiola 2014, 137). The instrument of separation implies a certain degree of physical isolation of the actor who wants to secure the solitude condition for himself: this isolation can take place in various ways, distinguishable according to the object on which the causative behavior of the actor seeking solitude insists, aimed at causing the consequent behavior of absence of observation (i.e. a non-action). Individual A may exercise power in a hidden form: she may isolate himself physically in a hidden manner, e.g. by going into hiding, by insisting on the environmental situation; she may act on C's unconscious psychological processes; she may employ the technique of lying, of suppressing information or of over-information with respect to her own physical location or with respect to elements that may vary C's salience with respect to their observation; A may also exercise open power, either intentionally or with interest: she may physically isolate itself explicitly, either through domestic isolation or by giving itself over to hermitism; she may employ open arguments aimed at persuading C not to observe; she may directly inject rewards (remuneration) or threats (coercion) aimed at altering C's assessments of costs and benefits with respect to observation. I call any action aimed at breaking the condition of solitude from the outside solitude breaching. This can be of two kinds: overlappings of power failure of the causative behavior of A towards C and hidden forms of power of C towards A; the exercise of power based on different forms of causative behaviors on the part of C, aimed at causing A's acceptance of the observation (and – consequently – exit from the condition of loneliness). In the first case, A demonstrates that she wants to isolate herself, but C manages to employ various techniques to observe nevertheless, keeping this practice hidden, without which – most probably – A would behave differently: C's observing behavior is aimed at collecting data or information and not at causing A's behavior, yet C's observation is only possible to the extent that A believes that C is behaving in a consequent manner of non-observation. In this case, there is an overlap between the failure of power in the direction $A \rightarrow C$ and the exercise of covert power $A \rightarrow C$, in which

C's causing behavior is some form of simulation of the behavior resulting from the power relation $A \rightarrow C$ and the resulting behavior is the performance of actions by A, as if there were no action on C's part: A is convinced that her condition of loneliness is guaranteed, whereas the violation consists of an actual intrusion on the part of C. In the second case, C exercises power, to alter A's behavior to allow herself to be observed: there is a change in A's behavior, as she stops performing the previous causative behavior aimed at causing C's non-observation. In this case, A emerges, through her own behavior, from the condition of loneliness, prompted by C's causative behavior.

TAB. 4. *Relations at the basis of the condition of solitude*

Condition	Relation	Direction	Actor A	Actor C
Solitude breaching	Isolation	$A \rightarrow C$	different forms of causative behaviors	no observation
	Overlapping of the power failure of Isolation (by A) and the hidden power of Observation (by C)	$A \leftarrow C$	Different forms of causative behaviors aimed at denying the observation by C	Hidden forms of power aimed at mimicking a lack of observation in order to observe A, who thinks of being isolated
	Solitude override	$C \rightarrow A$	Acceptance of observation	C exerts forms of power (when the solitude condition is guaranteed by pre-existing rights or by a power relation $A \rightarrow C$)

Source: own elaboration.

Intimacy is the «condition in which at least two individuals exchange personal information, without being subject to direct or indirect control by anyone who is not authorised» (Bocchiola 2014, 139). The instrument by which intimacy is achieved is confidentiality: the latter concerns both the information flow in the relationship between A and B and the absence (or conditioning, in the case of some kind of authorization) of observation or acquisition of information from the confidential information flow by C. In the presence of authorization to disclose part of the information from within the relationship (by A or B) or of the information acquired from outside (by C), the indirect limitations imposed by such authorization must also be considered. There are thus three power relations in the field to be taken into account: that between A and B concerning the fundamental level of confidentiality; that between the members of the relationship underlying the confidential flow of information

and C, with respect to the denial or limitation of the acquisition of information; and that between the members of the relationship underlying the confidential flow of information and C, with respect to the possibility of further transmitting, managing or using the acquired information. I call any action aimed at breaking the condition of intimacy, from the outside or from within, intimacy breaching. This can be of two kinds: overlappings of power failure of the behavior of the power relationship intended to achieve a condition of intimacy, with hidden power by the actor who wants to exploit intimate relationships to procure confidential information and employ it in unauthorised ways; the exercise of power based on different forms of causative behaviors by C, intended to cause A's acceptance of the observation (and – consequently – exit from the condition of intimacy). The overlap between power failures and hidden power can affect the three different relationships underlying the intimacy condition: with respect to the confidentiality internal to the A-B relationship, A engages in causative behavior aimed at maintaining the information exchanged within the relationship with B, or limiting its disclosure, while B feigns a consequential behavior expected by A in that relationship, which is the causative behavior of a hidden power relationship in which B exerts power over A aimed at causing the behavior of providing confidential information; with respect to the authorization of external actors, A or B engage in causative behavior aimed at keeping the information exchanged within the relationship between them, or limiting its disclosure, while C feigns compliance with the behavior desired by A or B, in order to be able to observe the flow of information at its own discretion, without it ceasing, due to the unwanted observation; with respect to the conditioning of the authorization failure – A or B engage in causative conduct aimed at limiting unwanted uses by C, who feigns compliance with A or B's desired conduct in order to obtain the desired information and use it at its own discretion, without this ceasing, due to the unwanted transmission, handling or use. The exercise of power to make A/B abandon the condition of intimacy affects, in the same way, all three relationships. C exercises power: convincing A or B to have the information exchanged within the confidential relationship handed over to them (confidentiality override); succeeding in getting A/B to allow themselves to be observed – even conditionally – (authorization override); succeeding in altering the conditions of further use of the information obtained from the confidential relationship (conditioning of the authorization override). In all these cases, C exercises power in order to change A's or B's behavior, in that it stops performing the previous causative behavior aimed at causing the conditioned or non-observation, the conditioning of the observation, or prompting A or B to directly confide the information outside the confidential relationship. It should also be borne in mind that an internal

confidentiality override may occur, i.e. an exercise of open power by B towards A aimed at making her disclose the internal information, limitedly or conditionally.

Tab. 5. *Relations at the basis of the condition of intimacy*

Condition	Relation	Direction	Actor A	Actor B	Actor C
Intimacy	Confidentiality	$A \rightarrow B$	Different forms of causative behaviors	Conditioned (or no) disclosure of information outside of the relation	-
	Authorization of external actors	$A/B \rightarrow C$	Different forms of causative behaviors		Conditioned (or no) observation of / acquisition through the exchange of information
	Conditioning of the authorization of external actors	$A/B \rightarrow C$	Different forms of causative behaviors		Conditioned transmission, management and use of obtained information
	Overlapping of the power failure of Confidentiality (by A) and the hidden power of disclosure by (by B)	$A \leftarrow B$	Different forms of causative behaviors aimed at denying or conditioning the disclosure of information outside of the relation (power failure)	Hidden forms of power aimed at mimicking a confidential relation in order to get the information to further disclose (hidden power)	
	Overlapping of the power failure of Authorization of external actors (by A/B) and the hidden power of Observation (by C)	$A/B \leftarrow C$	Different forms of causative behaviors aimed at denying or conditioning the observation to C (power failure)		Hidden forms of power mimicking the consequent behavior aimed by A/B in order to observe / acquire information through the exchange of information
Intimacy breaching	Overlapping of the power failure of the Conditioning of the authorization (by A/B) and the hidden power of Unconditioned, transmission, management and use (by C)	$A/B \leftarrow C$	Different forms of causative behaviors aimed at conditioning the transmission, management and use of the information obtained by C (power failure)		Hidden forms of power mimicking the consequent behavior aimed by A/B in order to unconditionally transmit, manage and use the obtained information
	Internal confidentiality override	$B \rightarrow A$	Conditioned (or unconditioned) disclosure of information outside of the relation	Different forms of causative behaviors	-
	Confidentiality override	$C \rightarrow A/B$	Disclosure of information outside of the relationship		C exerts forms of power aimed at acquiring information from the relationship A/B (when the intimacy condition is guaranteed by pre-existing rights or by a power relation $A/B \rightarrow C$)
	Authorization override	$C \rightarrow A/B$	Acceptance of observation		C exerts forms of power aimed at observing the relationship A/B (when the intimacy condition is guaranteed by pre-existing rights or by a power relation $A/B \rightarrow C$)
	Conditioning of the authorization override (P)	$C \rightarrow A/B$	Acceptance of new conditions (or no) authorization		C exerts forms of power aimed at unconditionally transmit, manage and use the obtained information from the relationship A/B (when the intimacy condition is guaranteed by pre-existing rights or by a power relation $A/B \rightarrow C$)

Source: own elaboration.

Anonymity is «the condition in which an individual or group of individuals is not subject to direct or indirect control by a third party in a public place, without consent, implicit or explicit» (Bocchiola 2014, 139). This condition «concerns the so-called right to be forgotten, that is, the indifference we seek in the public sphere of our social interactions, such as during a walk in a park, but also in our relationships with social institutions, such as medical facilities. Anonymity is the condition in which personal data [...] can be collected for some purpose, but cannot be used or disclosed without consent» (Bocchiola 2014, 138). Anonymity is strongly characterized by the intervention of political power, both because the maintenance of the condition is often directly devolved to State institutions and because of the need to guarantee a network of rights innervated throughout the information lifecycle, in ways that would be extremely complex for individuals, which exposure in a public place completely limits a whole series of actions to ensure the absence of direct or indirect control. Such dynamics are even more evident where there is a strong imbalance of cognitive and material resources between the observed and the observer, due to the concentration of information lifecycle resources in the hands of a few actors (West 2019; Zuboff 2019).

In this case, there are multiple characterising elements: the first concerns the performance of actions in the public sphere, then the absence of direct control (e.g., within the same group or directly by an external observer) or indirect control (e.g., by a recipient of an external observer) must be considered; the authorizing element of consent, implicit or explicit, must also be considered here. For ease of analysis, I will distinguish between individual and group anonymity.

The absence of actions aimed at separation from the social sphere by A constitutes the main distinction between the condition of solitude and the condition of anonymity. A's causative behaviors are thus aimed at causing indifference in C's observation, rather than limiting it altogether: such indifference may concern, for instance, the depth and detail of the information gathered; in a complementary way, actors who have access to such information may be allowed additional conditions with respect to its use. The actions underlying anonymity breaching can belong to two categories: power failure of A's causative behavior towards C; the exercise of power based on different forms of causative behaviors by C, aimed at causing A's acceptance of observation. In the first case, A shows that he wants to limit the collection of information directed at herself by external actors, but C succeeds in employing different techniques to observe anyway (by pretending, for example, to behave in accordance with A's causative behavior): in this case, C's observation behavior is aimed at collecting data or information and not at causing A's behaviour, but such collection can only take place if A is convinced that C is compliant

with her own causative behaviour. There is thus an overlap between the failure of A's power over C and that of C's successful hidden power over A. There is a similar overlap between the failure of power of A trying to limit the use of the information gathered by C, who pretends to maintain the consequent behaviour, but in fact exercises hidden power in order to be able to use that information for purposes other than those explicitly established in the basic relationship. In the second case, C exercises power – open or hidden – in order to persuade A to allow herself to be observed or to allow the information gathered from observation to be employed for tasks other than those previously intended by A: there is a change in A's behavior, in that she stops carrying out the previous causative behavior aimed at causing non-observation or conditioning C's use of the information gathered (or exploiting the mechanisms connected with the existence of rights established by political authority).

Conceptually, group anonymity differs little from individual anonymity. The only element of further complexity concerns the need for agreement on anonymity from outside by members of the same group: this mainly concerns the flow of information that one would like to keep covered by anonymity from within the group to outside. The other dynamics concerning individual anonymity also apply to group anonymity. Also for this information flow, the actions underlying anonymity breaching can belong to two categories: power failure of the causative behavior of A/B towards C and of A towards B (generically representing intra-group relations); the exercise of power based on different forms of causative behaviors by C, aimed at causing the acceptance of observation by A or the handing over of information to which anonymity would have been desired by an individual B. With respect to the first type, two dynamics can occur: A and B show that they want to limit the collection of information directed at themselves by external actors, but C succeeds in employing various techniques to observe anyway (e.g. by pretending to behave in accordance with A and B's causative behavior): in this case, C's observational behavior is aimed at collecting data or information and not at causing A and B's behavior, but such collection can only take place if A and B are convinced that C is compliant with their causative behavior. There is thus an overlap between the failure of A's power over C and that of C's successful hidden power over A; the overlap between A's exercise of power manifesting a desire to maintain anonymity over a certain block of information towards B, who is part of the same group, which, however, feigns compliance with that desire, only to open up a flow of that anonymised information to the outside world works similarly.

In the second case, C exercises power – open or hidden – to persuade A to allow herself to be observed or to allow the information gathered from observation to be employed for tasks other than those previously desired by

A: there is a change in A's behaviour, in that he stops the previous causative behavior aimed at causing non-observation or conditioning the use of the information gathered by C.

TABLE 6. Relations at the basis of the condition of anonymity

Condition	Relation	Direction	Actor A	Actor B	Actor C
Group anonymity	Anonymity inside the group	A → B	different forms of causative behaviors	conditioned disclosure of information outside of the group	-
Group and individual anonymity	Conditioned observation in a public place	A/B → C	different forms of causative behaviors		conditioned observation of / acquisition through the exchange of information
	Acquired information management	A/B → C	different forms of causative behaviors		conditioned transmission, management and use of obtained information
Group anonymity breaching	Overlapping of the power failure of Anonymity inside the group (by A) and the hidden power of Unconditioned disclosure of information outside of the group (by C)	A ← B	Different forms of causative behaviors aimed at keeping anonymous information inside the group (power failure)	Hidden forms of power aimed at mimicking a compliance to A's causative behaviors in order to disclose anonymous information outside the group (hidden power)	-
	Internal confidentiality override	B → A	Conditioned (or unconditioned) disclosure of information outside of the relation	Different forms of causative behaviors	-
	Anonymity inside the group override	C → A/B	Different forms of consequent behaviors		C convinces A/B provide information
Group and individual anonymity breaching	Overlapping of the power failure of Conditioning the observation in public place (by A) and the hidden power of Unconditioned observation (by C)	A/B ← C	Different forms of causative behaviors aimed at conditioning the observation by C (power failure)		Hidden forms of power aimed at mimicking a compliance to A's causative behaviors in order to observe A who's thinking to act in anonymity (hidden power)
	Overlapping of the power failure of Anonymity inside the group (by A) and the hidden power of Unconditioned disclosure of information outside of the group (by C)	A/B ← C	Different forms of causative behaviors aimed at conditioning the authorization of acquired information management by C (power failure)		Hidden forms of power aimed at mimicking a compliance to A's causative behaviors in order to unconditionally transmit, manage and use the obtained information (hidden power)
	Anonymity override	C → A/B	Different forms of consequent behaviors		C engages in behaviour intended to cause A/B observation
	Authorization override	C → A/B	Different forms of consequent behaviors		C engages in behaviour aimed at causing unconditional transmission, handling and use of the information obtained

Source: own elaboration.

What has been defined so far concerns the relations between actors within a social field in the absence of actors holding political power. On the contrary, within the political arena of competence, political power produces rights «that stabilise and protect the acquisition of final goods, for the social field of reference» (Stoppino 2001, 297). Stoppino presents five forms of political production of rights: external protection, full jurisdiction (and full internal protection), regulation, facilitation and allocation. These forms of political production are complemented by further instrumental activities, which facilitate political production per se: organization of institutions and apparatuses, extraction of resources from society, nurturing of trust (Stoppino 2001, 302). Political power can intervene mainly in two ways in order to make the power of A and B (as individuals) the basis of the desired conditions of a right: by guaranteeing its consistency through norms and rules or through the possibility of preventive or consequential enforcement of breaches; by directly providing resources so as to increase the power capabilities of A or B. Nevertheless, we should always consider that, even in the opposite direction, the breaches by non-state actors (C) enunciated above can also be addressed to power relations elevated to rights.

TABLE 7. *Correspondence between forms of political production and possible roles of political power in relation to the personal data-related relations at the basis of the different conditions*

Forms of political production	Possible roles of political power
External protection	C Enforcement towards C of rights of A or B Enforcement towards A or B of rights of C (legitimised breach or conditioning of a particular relation)
Full jurisdiction	C Enforcement towards C of rights of A or B Enforcement towards A or B of rights of C (legitimised breach or conditioning of a particular relation)
Regulation	Enforcement towards C of rights of A or B Enforcement towards A or B of rights of C (legitimised breach or conditioning of a particular relation)
Facilitation	Enforcement towards C of rights of A or B Enforcement towards A or B of rights of C (legitimised breach or conditioning of a particular relation)
Allocation	C Provision of resources to A or B to ensure different conditions Provision of resources to C to ensure the breach of a non-legitimised condition by A or B or to condition a particular relation between A/B and C

Source: own elaboration.

Political power can act with respect to rights concerning all four main stages of the information lifecycle. With respect to solitude, political power can act primarily with respect to rights concerning generation (guaranteeing the generating actor not to be observed from the outside) and observation

(denying or conditioning observation). These rights can either be enshrined directly or indirectly, through the securing of other rights that enable the actor to employ other resources at its disposal (e.g., the right to private property, which an individual can exploit to isolate herself from the outside world). Political power can act on all four stages of the information lifecycle with respect to rights related to the condition of intimacy: with respect to generation, it can guarantee rights with respect to individuals and the relationship itself; with respect to observation, it can guarantee rights directed either toward denial or conditioning (either with respect to in-person relationships or confidential transmissions of correspondence, physical or digital); with respect to management and use, it can guarantee rights either with respect to denial of employment or to conditioning it. With respect to anonymity, political power can act on all four stages of the information lifecycle: with respect to generation, it can guarantee rights regarding the limitation or conditionality of what can be covered by anonymity; with respect to observation, it can limit both the type of data that can be extracted, the actors, and the conditions; and with respect to management and use, it can provide particular conditions or deny its use outside of certain domains.

TAB. 8. *Information lifecycle phases on which political authority can establish rights for each condition*

Condition	IL's phases (A)	IL's phases (B)	IL's phases (C)
Solitude	Generation Extraction (by C)	-	Extraction (of A)
Intimacy	Generation Extraction (by B or C) Management (by A, B or C) Use (by A, B or C)	Generation Extraction (by A or C) Management (by A, B or C) Use (by A, B or C)	Extraction (of A or B) Management (from A, B or of obtained info from previous Extraction) Use (of previous Managed information)
Anonymity	Generation Extraction (by B or C) Management (by A, B or C) Use (by A, B or C)	Generation Extraction (by B or C) Management (by A, B or C) Use (by A, B or C)	Extraction (of A or B) Management (from A, B or of obtained info from previous Extraction) Use (of previous Managed information)

Source: own elaboration.

With respect to intimacy and solitude, in particular, political power can act to guarantee rights that insist not only on individual stages of the information lifecycle, but also on the cycle as a whole: the combination of different rights is particularly important when they enshrine certain elements concerning the accountability of actions carried out by actors managing the personal data of other actors. The awareness of the compliance of the consequent

behavior of a right or power relationship turns out to be a key component to verify that there is no manipulative behavior or behavior that – even indirectly – leads to the violation of conditions set within the different relationships. Two examples may relate to awareness, through monitoring, of the use of one's data in the medium to long term by private actors and information aimed at generators of personal data managed by third-party actors, in the case of a data breach: in the first case, information about the use of one's own information can be useful in verifying that the desired or guaranteed conditions are actually met, offering a counterbalancing tool to the possible discretion of those who hold that data at a given time; in the second case, information with respect to a data theft or loss would allow the development of the individual generator's knowledge of the possibility that that data could be used maliciously by some actor.

5. Conclusion

In this article I presented a theoretical framework based on the simplified information lifecycle model, used to identify the framework of the conditions concerning personal data-related relations between actors, whose related rights can be analysed within the framework of Stoppino's political theory.

The general theoretical framework offered in this article is applicable to the empirical analysis of different phenomena. First, it is possible to analyse particular actions and objects referring to particular practices, e.g. the use of different forms of acceptance of privacy notices by different types of actors for the provision of services. Another application can be the analysis of a body of law concerning privacy and data protection regulations – and in general all regulations concerning individuals' personal data, categorising its components, in order to understand what form of policy production (referring to Tab. 7 categories) is envisaged with respect to a particular right and related condition (as associated in Tab. 8). A further example use concerns the direct analysis of the processes of extracting, managing, and using personal data, in order to verify their actual compliance with existing rights frameworks and, if so, what possible conditions they may violate. A micro-level potential application may concern the analysis of the behaviour of individuals concerning their personal data, both in the absence and in the presence of rights established by the State, categorising them within the categories of Tab. 8.

The future development of this theoretical framework will certainly imply the empirical application to one of these cases.

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