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Veronica Moretti e Barbara Morsello (eds.)

Interferenze Digitali. Prospettive Sociologiche su Tecnologie, Biomedicina e Identità di Genere [*Digital Interference. Sociological Perspectives on Technologies, Biomedicine and Gender Identity*], Milano, FrancoAngeli, 2019, pp. 184

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When students ask me how to evaluate the quality of a book, I use to answer: "a book that deserves to be read is a book that teach us something". However, this sentence needs to be at once amended: a book must teach us something not recurring to any universalistic methodology, rather grounding its insights in embodied and embedded cartographies. That's exactly what *Interferenze Digitali* does, it provides us new pieces of situated knowledge (Haraway 1997) that take its own space and time in the framework of posthuman knowledge (Braidotti 2020). Reading *Interferenze Digitali,* edited by Veronica Moretti and Barbara Morsello in 2019 for FrancoAngeli, we not only learn a lot on cutting-edge bio/infotechnologies, but we also know more about *our bodies, ourselves* in the biomedical arena. *Interferenze Digitali* it's a cartography of the bodies that we are becoming. We are not all man and neurotypical, there is a plethora of non-conforming subjectivities that simultaneously upsets both male-centered medicine and male-centered sociology. *Interferenze Digitali* helps us in knowing these non-conforming subjectivities: in this book you will encounter non-standard bodies with all their living questions, not depicted as isolated and abstracted, rather as part of a *natureculture* continuum. All the essays collected in the volume share this belief, as Assunta Viteritti states in the preface: "human beings [...] cannot be understood and analyzed a priori as autonomous entities abstracted from the matter, rather they are actors intertwined in heterogeneous techniques, social spaces and network" (p. 7).

These complex heterogeneous techniques, social spaces and network in which human beings, together with others, became, need to be scrutinized all the more today that bio/infotechnologies are so pervasive and fast-changing. *Interferenze Digitali* is fully devoted to this task, in the attempt of contributing to the debate on how cutting-edge technologies are reshaping care and health. The third chapter, titled "Mano, Cervello, Cuore: Uno Sguardo di Genere e Femminista sul sapere scientifico" ("Hand, Brain, Heart: A Gender and Feminist Look at Scientific Knowledge"), written by Maria C. Sciannamblo, constitutes the theoretical framework of the collective volume. Here Sciannamblo asks the crucial question: "how do knowledge and narratives change when adopting a gender perspective?" (p. 50).

All authors agree on the starting point: to adopt a gender perspective in science and technologies studies means to embrace the situated knowledge methodologies, as Moretti and Morsello remind us quoting Haraway: "only a partial perspective can allow an objective vision" (p. 12). When the universal masculine model is no longer the only subject of knowledge, when a gender sensitive and feminist gaze is applied to science and in particular to medicine, what come in foreground are the embodied and embedded experiences of sickness, care and cure. No one of the experiences analyzed in the volume pretend to be an "all-representative case". Sickness, care and cure experiences are always grounded in highly different subjectivities, shaped by sex and gender, class, race and age: *hybrid identities,* in Morsello's words.

Female cancer patients, diabetic men, physicians, menstruating people struggling with various types of apps, enhanced bodies at work: you will encounter this and much more in the ten chapters of the volume. In chapter one Veronica Moretti focuses on the digital surveillance in the socio-medical framework, in chapter two Barbara Morsello analyses the recent innovations in genetic screenings and how the affect gender relations. As anticipated, in the third chapter Maria C. Sciannamblo provides a feminist theoretical framework for thinking science. In the fourth and the fifth chapters Marta Gibin and Valentina Cappi respectively scrutinize blogs and medical drama to highlight the ongoing mutations in desires and genders' roles. In chapters six and seven Letizia Zampino and Valeria Quaglia focus on health's self-monitoring technologies for both genders, while in the eighth chapter Flavia Atzori broaden the reflection introducing the issue of male chronic illness. Chapter nine and ten, written respectively by Lia Tirabeni and Arianna Radin, analyze the intersections between health, care and work environment, focusing not only on patients but also on medical personnel.

Let us focus on three chapters: "Identità ibride. Come le innovazioni biomediche modificano pratiche e routine nelle pazienti oncologiche" (*Hybrid Identities: How Biomedical Innovation are Modifying Oncological Patients' Practices and Routines*, Barbara Morsello); "Quando una madre si ammala di cancro: gestire la cura dei figli tra aspettative e ruoli di genere" (*When a Mother Gets Cancer: Managing Childcare between Expectations and Gender Roles*, Marta Gibin) and "Biomedicalizzare la sindrome premestruale: come le app prescrivono conoscenze e corpi" (*Biomedicalizing Pre-menstrual Syndrome: Apps Prescribing Knowledge and Bodies,* Letizia Zampino).

Before looking closely at these three chapters, I must explain that my choice is not neutral neither impartial. Morsello, Gibin and Zampino chapters interpellated me not only as a Gender Science and Technologies Studies' scholar, they also interpellated the multiple layers that build together the hybrid subjectivity that I am. Reading Morsello, Gibin and Zampino I felt involved as a daughter and as a woman, in particular as daughter of a mother with breast cancers and as a woman still in her reproductive age with all the troubles linked with having female reproductive organs, tissues and fluids in these techno-mediated yet still very misogynous days.

I emphasize here my embodied and embedded reading to pay homage at the explicit aims of the editors: "the will to start from personal and biographical experience" always joint with "our gendered perspective as young researchers" (p. 11). As for Gibin essay, I am a very partial reader, one that three times in her life struggled together with her mother against different kinds of cancer. *My mother is a cyborg*, writes Ilaria Santoemma (2020), and adding to Santoemma a Butler's novel title (1978), I would say: "my mother is a cyborg and a survivor". First the uterine cancer, followed by a hysterectomy, later she also experienced breast cancer, twice. I am an only child grew up among several serious diseases, since while my mother experienced few years of peace between a cancer and another, my father ended in hospital for chronic ulcer.

I grew up looking at my mother packing bags for the clinics: for herself as well as for my father. Now, in tune with Gibin's essay, I cannot avoid asking: who healed my family? Who cared for my mother and my father, who cared for me and in which different ways?

To answer these questions Gibin adopted the online ethnography's methodology, analyzing conversations and narratives on cancers, focusing in particular on blogs written by mothers with cancers and under 14 children. In these online diaries emerge how care and cure are strictly entailed, how they are not distributed equally among genders. Gibin's contribution shed light not only on expectations shaped by gender rules that negatively affect the subjectivities at stake, but also on the impact of sexual division of labor on the illness itself. I've seen my mother struggling against cancers as well as against social expectations and gender rules, just like the mothers/bloggers of Gibin's research. I've seen myself struggling against the fears of losing my mother as well as against the fear of developing in my turn the same cancers, just like the daughters of the oncological patients interviewed by Morsello.

Gibin's and Morsello's essays offer us the possibility to look at oncological patients in a way that differs from the traditional bioethical approach, too focused on the patient as "autonomous subject". They are aware that bioethics, in particular in western society, adopting the concept of "autonomous subject" contributed to the spread of an egoistic and individualistic subject. They are also aware that the classical physician-patient relationship is not only hardly appliable in these days of biomedical and infotechnological innovations, but also unfair and unbalanced. They reckon the physician-patient relationship is not the only social dynamics worthy to be investigated. We see together with Morsello and Gibin that patients are more "subjectivities in relation" that "autonomous subject" and that there is a whole network of relations around patients as well as multiple layers inside them.

Morsello brilliantly shows how patients are hybrid identities that structure themselves in relation with biomedical innovations highlighting the points of view of "privileged actors: patients and their experience of embodiment of early diagnosis practices" (p. 36). Her qualitative research included 51 female patients aged 44-65, to explore their risks perceptions, genetic mutation and their attitude towards biomedical innovations. She concluded that patient's agency has always a pivotal role in "defining specific knowledge ecologies in which the body becomes both a catalyst for care practices and a self-affirmation device" (p. 47). Patients' agency is also at the center of the mothers with cancer/bloggers' self-narratives investigated by Gibin, even if as a site of conflicts and contradictions. Thus, reading Morsello and Gibin together enable us to see how agency does not correspond to a will's act, at least not for women that have to mediate and negotiate their illness with their relatives. Patients' agencies emerge from their essays as a negotiation process, one that involves different actors with diverse degree of responsibility, specific needs and know-how.

The problematization of agency is the conceptual junction of the volume but it is in the essay of Zampino that we can find a statement that clearly argues in favor of a relational agency tenet: "agency is relational and it works inside and across intra-actions among humans and non-human beings acting together in the process of constitution of emerging, situated and endless becoming assemblages" (p. 101).

In Zampino contribution patients' agency also implies the self-aware use of pharmacological and infotechnological devices. In her essay, the role played by the online "light" programs, such as apps, is at the center of the analysis. Embracing a feminist and materialist approach, Zampino believes that apps are in relation with humans in "human-app-assemblages in which living matter is an active part in the process of co-building of bodies, meanings and languages" (p. 101). Smartphones and digital body devices nowadays provide us with the possibility of using "self-tracking medical apps" and this fact itself should be object of in-depth studies for enquiring both their role as subjective agency's instruments and as bodies' controlling devices, not only in the hands of patients but especially in the hands of "pharmaceutical industries, governments, research centers" (p. 100).

As for Morsello and Gibin's essays, also for Zampino contribution I have to admit I am a deeply concerned reviewer, one that suffered of amenorrhea and folliculitis. Zampino's conclusion resonate with my personal experience as user of menstrual cycle monitoring apps. They really supported me in the attempt of gaining more knowledge on my bodily transformations. However, exactly as Zampino demonstrated through her qualitative analysis of 20 monitoring menstrual cycles apps, some apps seemed to me too invasive and scrupulous in their attempt to improve my health. The border between self-empowering, a process in which the subjectivity of the patient is pivotal, and biomedicalization, a process in which to be pivotal are the interests of biotech farms and start-ups, is a tiny and thin one. Zampino refers to the concept of "datification" to clarify the issue of biotech farms' interests. The biotech market is highly interested in gathering our biological and behavioral data, since analyzing these data allow them to "influence citizenship's choices and lifestyles" (100). I share with Zampino this concern, especially regarding women in reproductive age, too exposed to various kind of influences and social pressures and immersed in cultures full of gender biases.

New technologies appear to have both a bright and a dark side and I reckon in *Interferenze Digitali* both are explored in an excellent way. Editors and authors seem very conscious of the tiny and thin border in which all of us move when confronting with health in the XXI century. This tiny and thin border is indeed very crowded: how many times have we found ourselves and the people we love intra-acting with drugs, apps, clinics, physicians and diseases, trying to navigate the precarious paths for a better health?

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