

## **Social Inequalities Beyond the Modern Nature-Society-Divide?**

### **The Cases of Cosmetic Surgery and Predictive Genetic Testing<sup>1</sup>**

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received 1 February 2005, received in revised form 11 May 2005, accepted 25 May 2005

#### **Abstract**

Due to the accelerated dynamics of scientific and technological modernisation over the last few decades, the sharp and unambiguous categorical distinction and separation between "nature" and "society" that has been essential for the self-perception of Western modernity is increasingly subject to erosion or even dissolution. The article aims to explore the possible consequences of this blurring of boundaries with regard to the generation, social perception, and justification of social inequalities in "reflexive modern" societies. Using the examples of cosmetic surgery and predictive genetic testing, current tendencies of a seemingly paradoxical "renaturalisation" of inequality are outlined: contrary as well as parallel to the modern programme and promise of a "denaturalisation of society" (Jürgen Habermas), "natural" characteristics such as physical appearance or genetic constitution are gaining importance in terms of social distinction and discrimination. One should, however, not fail to see that this renaturalisation is not simply a revival of older (if by no means definitely overcome) forms of social inequalities based on (presumably) natural collective categories (sex, race, ethnicity and so on). Rather, a hybrid, scientifically and technically manufactured human "nature" becomes a medium of novel forms of "individualised" discrimination: physical characteristics are no longer ascribed to certain groups or people as their inalterable natural qualities, but are increasingly conceived of as open to fashioning and therefore as socially achieved by the individual person. For this reason, the new inequalities "beyond" the modern nature-society divide are apparently not considered fundamentally illegitimate or "pre-modern". What seems to be needed in present-day societies is the establishment of new, socially accepted regulations and boundaries for the complex and intertwined dynamics of denaturalisation and renaturalisation of the social.

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<sup>1</sup> I would like to thank two anonymous reviewers and the editors of the journal for their helpful comments on an earlier draft of this article.

## 1 Introduction: Denaturalisation or Renaturalisation of Social Inequalities?

At least in their own self-esteem, modern Western societies follow a logic of a continuing "desocialising of nature" and "denaturalising of society" (Habermas 1981: 80).<sup>2</sup> According to Habermas (ibid.), the basis of this is the categorical distinction and separation between the "causal connections of nature" on the one hand, and the "normative orders of society" on the other. Apparently, this distinction is of central importance for the development and justification of social inequalities in modern societies. The self-perception and moral foundations of Western modernity legitimise only those forms of unequal treatment that are based on *social*, achieved traits of certain persons or groups, while discrimination referring to ascribed, (actually or presumed) *natural* differences is attributed to "traditional" societies and is therefore no longer acceptable.<sup>3</sup> In the course of societal modernisation, one can thus expect that there will be an increasingly precise distinction between natural and achieved traits as well as a tendency to denaturalise social inequalities, which will result in a gradual repression of discrimination based on a certain person's or group's "natural" characteristics (sex, skin colour, race, ethnicity, etc.). Of course, modern societies do not reach the high standards they have set for themselves; discrimination based on natural categories still exists, and is even produced by those societies themselves. Nevertheless, modern laws and normative systems at least delegitimate nature-based social inequalities as, for instance, can be seen in the anti-discrimination laws the

member states of the European Union are obliged to sign.<sup>4</sup>

The distinction, be it explicit or implicit, between "social" and "natural", between the "made" (*dem Gemachten*) and the "grown" (*dem Gewachsenen*) (Habermas 2001) should not be misunderstood in an objectivist sense. It is not a factual, ontological difference, but the result of a social practice of distinction, a "boundary work" (Gieryn 1995) performed mainly by science. It is not crucial whether certain characteristics individuals or groups are credited with are "really" of natural or social origin, but whether they can be *attributed* to either nature or society in an uncontested way.<sup>5</sup> However, according to Habermas (1981: 80), modern Western societies are convinced that they (and they alone) make the "correct conceptual cuts" between natural causalities and social actions. The constructive and contingent character of these "cuts" is hidden by scientific "purification practices" as described by Bruno Latour. He argues that only these purifications give rise to "two completely separate ontological zones, that of humans on the one hand, and that of non-humans on the other" (Latour 1995: 19). In this way, the modern distinction between nature and society presents itself as merely a "discovery" of an objectively existing ontological difference that can thus claim general validity and unambiguity.

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<sup>4</sup> The massive protests in Germany in spring 2005 against proposed anti-discrimination laws can be regarded as an illustration of the fact that discrimination based on (ascribed) natural categories is still rampant in the everyday life of modern societies – regardless of the normative and legal superstructure.

<sup>5</sup> In some cases (for example, regarding intelligence) the attribution may be contested; in others it may be changed due to new scientific research, for example in the area of human genetics. Nevertheless, modern societies distinguish mainly with the help of the nature-society difference between legitimate and illegitimate reasons for differential treatment. It goes without saying that there is still illegitimate discrimination (for example, concerning religious beliefs or political convictions) that is not based on natural categories.

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<sup>2</sup> The quotations from German books or journals have been translated by the author of this article.

<sup>3</sup> Talcott Parsons' (1951: 58-67) well-known distinction between "ascription" and "achievement" points in the same direction; it is based on the distinction between traditional "community" and modern "society" (cf. Münch 2004: 63-69).

What does it mean for the production and legitimation of social inequalities that the distinction between "nature" and "society" has become ambiguous, and even seems to evaporate completely? This thesis is strongly supported by much of the research recently conducted, particularly in science and technology studies (e.g. Latour 1995; Amann 2000; Lindemann 2002; Karafyllis 2003) and in social theory, especially within the "theory of reflexive modernisation" (Lau/Keller 2001; Viehöver et al. 2004; Wehling et al. 2005). According to these theories, the growing scientific and technical control of natural processes itself as well as the intense social use of the resulting options are decisive in terms of blurring the nature/society distinction. I want to take up these arguments and show that both the cognitive-discursive and the practical-material erosion of the distinction between nature and society opens a new space of categorical and normative ambiguity. This new space allows the development of phenomena of inequality and domination that seem to be based on natural categories in a new way. The term "renaturalisation" can only tentatively describe this tendency since it is not just a revival of traditional, ascriptive inequalities. Instead, a hybrid, scientifically mediated, and technically manufactured "nature" gains relevance for forms and processes of social distinction which is not regarded as simply "premodern" or illegitimate.

In the following, I will first explain the extent to which it is possible to speak of an erosion of the modern distinction between nature and society in the light of recent scientific, technological, and social developments. I will then use two examples – cosmetic surgery and predictive genetic testing – to illustrate current tendencies towards the renaturalisation of social inequalities. Finally, I will present some general theoretical conclusions.

## 2 Beyond the Modern Nature-Society-Divide?

For a long time, modern societies and their institutions have relied on the

belief that the distinction between the social and the natural can be drawn by science in an objective, unambiguous, and universally applicable way. Boundaries that have been fundamental to modern self-perception, such as those between facts and values, are based on this belief. These boundaries play a central role in many institutional spheres of modern societies. This is especially visible in professional sports: only the results the athlete is able to achieve naturally are considered valid, and this has led to the introduction of an extensive doping control system. But at this point it also becomes clear that the boundaries between the "natural" and the "manipulated" body are no longer unambiguous: they are blurred by the use of biological substances for doping or the supposedly imminent application of methods of genetic enhancement ("gene doping") (cf. Wehling 2003a).

In recent years, a multitude of topical societal debates – for example, about the beginning of human life and brain death, about global climate change and genetically modified organisms – have shown that the categorical separation of nature and society that had previously appeared unambiguous is becoming increasingly unclear. Developments in intensive care medicine and transplant surgery, for instance, have led to the fact that the common-sense notion of the end of human life – a failure of the heart and lungs – has not simply been replaced but supplemented by and contrasted with the criterion of brain death (cf. Lock 1998, 2003; Schlich/Wiesemann 2002; Lindemann 2003). The answer to the question of when a human being is considered dead and thus ceases to be a social being entitled to a certain protection has become open to interpretation and has generated widely differing answers. The intensely polarising debates in these areas are indicative of the fact that a sharp and uncontested "cut" between the natural and the social is becoming increasingly impossible. This is not to say that an objective boundary that once used to exist is now dissolving due to scientific and technical innovations. Rather, the sciences that used to guarantee the objectivity of this distinction are less and

less able to fulfil this role, be it that the sciences themselves develop varying interpretations or that sciences and commonsense knowledge come into conflict. The former holds true for the debate about the legal and moral status of the human embryo; although it is possible to draw several lines to determine when a human life starts, it seems impossible to name one objective, exclusive point in time (cf. Markl 2004). One example of the latter case is the social conflict concerning agricultural biotechnology. Widespread notions of the "unnaturalness" of genetically modified foods (cf. Shaw 2002) clash with the scientific statement that there is no substantial difference between such foods and traditional, "naturally" grown produce. The consequence of such disputes is not to say that modern societies can straightforwardly do away with the distinction between what is given or "grown" on the one hand and what is "made" (and thus to be accounted for) on the other. However, the redefined and re-established boundaries are increasingly demonstrating their "reflexive", contingent character. Examples of this kind of flexibilisation are the rules for dealing with cloned human embryos and genetically engineered foods, which vary greatly on an international level, or the ongoing debate about the man-made vs. natural origins of climate change (see Wehling et al. 2005).

As the historian of science Hans-Jörg Rheinberger (1996: 289) supposes in regard to biomedicine and genetic engineering, we are currently becoming "witnesses to a global and irreversible transformation of living beings, including humans, into purposefully constructed beings". The decisive factor is that with the advent of molecular biology, "for the first time ever" metabolic processes have become "open to manipulation on the level of *instruction*" (ibid.: 291 – italics in original). According to Rheinberger, the organism itself becomes a laboratory: "From now on, it is not the extracellular representation of intracellular processes, i.e. the 'understanding' of life, that counts. Instead, what matters is the intracellular representation of an extracellular project, i.e. the 'rewriting' of life." (ibid.) As a result, the

social understanding of "natural" differences and inequalities as well as the collective and individual dealing with them can change profoundly. Rheinberger argues that the "mission of sociality" no longer seems to be "...to neutralise our natural – genetic – constitution, but to change it. We are becoming aware that the construction of a *natural* constitution of humankind is changing into a *social* construct – with the result that the distinction between the 'natural' and the 'social' no longer makes any proper ontological sense." (ibid.: 298 – italics in original). The fiction of ontology, promoted by the sciences, loses its persuasiveness, and thus the idea of the "natural" or "grown" no longer seems to serve the purpose of cultural and normative orientation. Using the examples of cosmetic surgery and predictive genetic testing, I want to show how not only the overarching distinction between the natural and the social has been eroded, but also how more specific boundaries – for example, between illness and health or between healing and optimising the human body – have become ambiguous. As a consequence, there is a tendency towards renaturalising social inequalities in modern societies.

### 3 Cosmetic Surgery: The Technical Improvement of the Body as a Social Norm?

With the help of aggressive advertising and media promotion, the surgical remodelling of the body has become almost completely disconnected from therapeutic contexts (for example, healing victims of war or accidents) during recent decades.<sup>6</sup> It is becoming a "mass phenomenon" (Davis 1995:

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<sup>6</sup> Nevertheless, the boundaries between *healing* of physical deformities and/or the ensuing psychological traumas on the one hand, and the *enhancement* and *optimisation* of a "normal" and "healthy" body on the other are not fixed. Cosmetic surgery is thus a striking example of a wider tendency towards "dissolving the boundaries of therapy" (*Entgrenzung von Therapie*) in modern societies. The use of medical technologies is increasingly expanding beyond well-defined therapeutic contexts.

16), a virtually everyday practice that is no longer a taboo. In his book "Cultural History of Aesthetic Surgery", Sander Gilman states that "the stigmatising quality of the procedures seems to be diminishing" (1999: 33). It is estimated that the number of cosmetic operations in the Federal Republic of Germany has tripled over the last ten years, and that about half a million to a million procedures are carried out every year (Kahlweit 2004; cf. also Degele 2004: 19). For other countries, such as the United States, Brazil, or China, even more dramatic increases in numbers are estimated. Patients are becoming younger and younger, and although women are still in the majority, more and more men also use cosmetic surgery.<sup>7</sup>

One's "own" body increasingly seems to be regarded as something that can be shaped to suit one's wishes. Apparently, its "naturalness" and "integrity" no longer serve as barriers to technical interventions. This becomes interesting for social theory and the sociology of social inequalities inasmuch as cosmetic surgery is carried out not just to enhance self-esteem or recognition in the social sphere, but is also becoming a tool of career planning (cf. Degele 2004: 15). This seems to be an increasingly important motive for customers. In the People's Republic of China, more than half the university graduates interviewed stated that "beauty is a decisive advantage in the job market" (Maass 2004a: 1). There is no question that the use of make-up, hair dye, dieting, etc. has always been a means of enhancing one's chances in the job market or rising through the ranks in a company. Cosmetic surgery has transformed and radicalised these practices by no longer aiming at

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<sup>7</sup> There is now a debate in the social sciences as to how far these equalizing tendencies will go. While Gilman (1999: 32) argues that men will gradually catch up with women, Davis (2003: 129) supposes "that the present gender gap in cosmetic surgery will prevail rather than it will disappear". In any case the motives and contexts vis-à-vis the use of cosmetic surgery are different for male and female "customers", and cosmetic surgery is by no means "gender-neutral" (ibid.)

changes *on* the body but *of* the body. Moreover, these changes are brought about by "invasive" surgical interventions that used to be almost exclusively reserved for therapeutic purposes. Such interventions are not only risky, painful, and rarely reversible. They also massively question the classic modern idea of the integrity and physical invulnerability of the body (Negrin 2002: 29). Against this background, cosmetic surgery can be seen as an example of a transition from the "natural artificiality" of the human being that was conceived by Helmuth Plessner (1981) as an anthropological invariable to a new and apparently much more problematic "artificial naturalness" (cf. Schramme 2002: 266-269).

The optimisation of the body via surgical procedures is increasingly becoming a social normalcy and even an expectation, at least in certain social milieus and segments of the job or marriage markets. Along the "borderline" between nature and society, the look of the body is becoming "physical capital", as one could say in extension of Pierre Bourdieu's differentiation between certain kinds of capital (Bourdieu 1983).<sup>8</sup> Cosmetic surgery constitutes the body as an object and medium of investment and accumulation of capital to a much higher degree than practices such as cosmetics, sport, or diets (cf. Negrin 2002: 36). Instead of cultural refining or the long and disciplined route of doing sports, the direct investment of financial resources moves centre-stage; long-term individual "achievement" with uncertain results is replaced by short-term visible "success" (cf. Neckel 2001). In this process, new and mostly anonymous societal patterns of domination arise – not so much because a fixed and (for most people) unreachable ideal of beauty is established, but more because the flexibility and willingness to continuously shape and "correct" the body is set as a cultural norm: "(N)o one is so beautiful that she can-

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<sup>8</sup> The US singer and actress Cher stated: "My body is my capital." She is said to have invested about 75,000 US dollars in cosmetic surgery. (Quote from Davis 1995: 18)

not become even more so with the help of surgery." (Davis 1995: 18)

At first sight, this development is taking place within the framework of the denaturalisation programme pursued by modern societies. The German philosopher Wolfgang Kersting emphatically celebrates the release from the arbitrariness of nature that the application of technical means has made possible: "With the help of technology, humans can emancipate themselves from nature and weaken the power of fate. Technology liberates via defatalisation and by increasing the power of control." (Kersting 2002: 294) The given and – with regard to beauty, strength, etc. – of course unequal as well as "unjust" distribution of physical attributes between individuals becomes the object of conscious and purposeful fashioning.<sup>9</sup> Feminist authors such as Kathy Davis (1995, 2003) rightly point out that women who underwent cosmetic operations try to regain control over their bodies and their heteronomous social perception. But this emancipation from the natural body, with all its real or imagined shortcomings, also results in a paradoxical effect of renaturalisation: physical attributes such as beauty or youthfulness gain enormous importance, can be used as a means of social distinction, and can even lead to advantages concerning one's career. Obviously this is seen less and less as questionable or illegitimate, because "body looks" are increasingly the result of technical modelling and can thus be attributed as an acquired trait to the respective person: "(W)e have become responsible for the design of our bodies." (Negrin 2002: 37) This is equally valid if the person has *not* had cos-

metic surgery: even the "natural" body that has not been manipulated is regarded as something socially imputable and as an object of social responsibility. Denaturalisation and renaturalisation of the social merge into one another, the distinction between ascribed and achieved characteristics becomes blurred and starts to lose its function of normative orientation.

#### 4 Predictive Genetic Testing: Discrimination or Legitimate Differentiation?

The case of predictive genetic testing demonstrates even more markedly than cosmetic surgery the newness, ambiguity, and ambivalence of the renaturalisation of social inequalities. The aim of predictive genetic testing is the diagnosis of individual genetic dispositions, based upon which it is possible to forecast, with a greater or lesser degree of probability, the occurrence of certain diseases such as hereditary breast cancer or Huntington Disease in later periods of life. For three reasons, this is a medical innovation with potentially serious consequences: firstly, predictive DNA tests make long-term prognoses over several years or even decades. Secondly, not only is it often unclear *when*, but also *whether* the disease will occur at all. This particularly applies when it comes to widespread diseases such as cancer or Alzheimer's that are not exclusively genetically determined, but are also dependent on environmental factors. Moreover, in many cases scientists dispute the extent to which genetic factors actually heighten the risk of becoming ill. Thirdly, the development of prevention and therapy falls short of the rapidly expanding diagnostics (cf. Damm 2004: 2).<sup>10</sup>

It is not surprising that this asymmetry can lead to grave social and psychological problems. On the one hand, the

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<sup>9</sup> In this context, it is remarkable that at a beauty contest in the People's Republic of China in 2004, proof of having had at least one instance of cosmetic surgery was a precondition for registering for the contest, and not – as usual – a reason for immediate exclusion (Maass 2004b). The organisers rewarded not the ("unjustly" distributed) natural beauty, but an artificial one instead – but this of course cannot be attained and perfected without certain "natural" bodily preconditions and sufficient economic resources.

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<sup>10</sup> Genetic factors are held responsible for more and more diseases. The number of these (putatively) "genetic diseases" registered in the so-called McKusick Catalogue – an important medical database – was about 5,000 in 1992, and rose to more than 14,000 in 2003 (Lemke 2004: 69).

people or families affected have to deal with the specific uncertainties of predictive genetic testing (cf. Cox/McKellin 1999): will the disease occur at all, when will it happen, and how serious will it be? How should one deal with the new knowledge and its ambivalences? Is it possible to protect oneself against the occurrence of the disease?<sup>11</sup> Or is it preferable to refrain from being tested at all because its use is dubious, given that prevention and therapy are lacking? On the other hand, this new form of diagnostics creates a new social category of "ill without symptoms" (Nelkin 1995) or "healthy ill" – the boundary between health and illness is being redefined, pluralised, and threatens to become blurred (Feuerstein et al. 2002: 42). Predictive genetic testing has thus become part of a tendency to "de-temporalise" illness, i.e. to expand the notion of illness beyond its acute, symptomatic manifestation and shift it to certain risk factors. Not only genetic dispositions, but also obesity and high blood pressure are part of these risk factors. Risk thus becomes an "illness category in and of itself" (Fosket 2004: 294), and the de-temporalisation of illness due to predictive diagnostics manifests itself in questions that are unusual and difficult to answer: "When does an hereditary disease 'begin'? At the moment of conception? With the knowledge that one has inherited the mutation? Once symptoms are undeniable? With diagnosis?" (Cox/McKellin 1999: 137)

With regard to the "pre-symptomatic ill", concerns have been raised for a few years now about the emergence of new forms of "genetic discrimination" or even a new "genetic underclass". "The term 'genetic discrimination' has been used to describe the differential treatment of individuals or their relatives based on actual or presumed

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<sup>11</sup> The best-known example of this dilemma is the prophylactic amputation of the breasts of women who are genetically "at risk" of developing breast cancer (cf. Halliwell 1999). The extent to which mutations of the so-called "breast cancer genes" BRCA 1 and BRCA 2 raise the real risk of developing the disease is still a matter of debate (cf. Lemke 2004: 71-72).

genetic differences, as opposed to discrimination based on phenotype." (Geller et al. 2002: 248) Especially in the United States, with its privatised social service and insurance systems, these effects are already starting to appear (Geller et al. 2002; Geller 2002): people who will only fall ill with a predicted disease in a few years' time – or perhaps never – are nonetheless discriminated against or even excluded from the job market, health services, and insurance. At the centre of the political and legal debates about predictive testing and genetic discrimination is the "right to ignorance" (*Recht auf Nichtwissen*, cf. Damm 1999; Wehling 2003b). Although quite unusual and unprecedented in modern societies, this right not to know one's own genetic constitution is in principle widely accepted. However, there is disagreement about the conditions under which individuals are obliged to get information about their genetic condition and reveal it to others (for example, to employers or insurance companies).<sup>12</sup> In addition, the question is how one can prevent the exercising of this "right to ignorance" from becoming a reason for social discrimination in itself.

The object of predictive genetic testing is not the factual visibility and actual presence of "phenotypical" differences between individuals. Thus, though not exactly in the same way as cosmetic surgery, genetic testing also creates and is concerned with a scientifically and technically manufactured "nature" that is taken out of its "real" temporal context. This results in many far-reaching categorical and normative ambiguities: may or must people who

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<sup>12</sup> For the legal aspects, compare Damm 2004. Recently, the Federation of German Insurance Companies has extended the voluntary renunciation of obligatory genetic testing for customers signing a new contract until 2011. However, the medical superintendent of the world's biggest reinsurance company, the 'Münchener Rück', declared only a few months later that, due to "fascinating developments", the insurance companies do not want any legal inhibition of the option to use genetic testing (*Frankfurter Rundschau*, 22.1.2005, 4).

are genetically "at risk" be treated like virtual patients, or is that an illegitimate discrimination against obviously healthy people? The epistemic status of predictive genetic knowledge itself thus becomes contested (cf. Damm 2004: 15): do the results of predictive diagnostics have a special status? Or can they be seen as a "normal" form of gathering medical information, as commonly used by insurance companies?<sup>13</sup> And if so, is it still appropriate to speak of genetic discrimination?

Scientific views on this issue differ widely, and mirror the categorical ambivalence of the problem. The debates focus on the question of whether a genetic disposition to certain diseases has to be regarded as an objective, *natural* cause or a *social*, scientific construct. The lawyer Jochen Taupitz, a member of the German national council on bioethics (*Nationaler Ethikrat*), argues that it is only possible to speak of discrimination if a person is treated differently "without a recognisable, factual reason" (Taupitz 2000: 31). According to Taupitz, the "potentially dangerous genetic disposition" (*die gefahrerhebliche genetische Disposition*) is "just as much as an illness, age, or (...) gender a factual reason for differentiation" (ibid.). Here, the genetic disposition is equated with an already manifest illness (or with old age and gender), and thus objectified as a natural fact and cause. The biologist and philosopher Christoph Rehmann-Sutter proposes a different view. He criticises the widely acknowledged "programme theory of DNA", which is also recognisable in Taupitz's statements; it presupposes that the genetic programme "contains an instruction to develop this characteristic or illness" (Rehmann-Sutter 2002: 217). Rehmann-Sutter contrasts this view with a "systemic theory of DNA", according to which a certain gene sequence is indeed a trace (*ein Indiz*), but does not already make the disease a latent reality in the present time (ibid.: 218): "The BRCA-1-mutation correlates with an

increased probability of getting cancer in the future, and is statistically significant; however, it is not an already present instruction for cancer." (ibid.: 221) In this view, the mutation of the gene is certainly a natural fact, but the correlation with the disease is a statistical construct, not an objective causal mechanism. In any case, it becomes evident that the blurring of the boundaries between health and illness, between factual and interpretative statements, between illegitimate discrimination and objectively justified differentiation, creates new areas of categorical and normative ambivalences that modern societies are not yet prepared for.<sup>14</sup> As Taupitz's arguments illustrate, new discursive horizons are opened up, in which differential treatment of individuals due to their supposedly natural genetic disposition can be legitimised or even presented as necessary.

## 5 Conclusion: Neutralising or Optimising (Human) Nature?

What can be concluded from the examples I have given? First of all, I want to show why the recent tendencies differ from older forms of discrimination based on "natural" categories. Finally, I will show what constitutes the new challenges for normative self-perception as well as the institutionalised practices of modern societies.

Older forms of naturalising social inequalities are mostly based on stigmatising people according to supposedly natural *collectives* such as race, nation, gender, sexual orientation, etc. that were - of course - always socially constructed (more often than not with the help of the sciences). The individual is discriminated against because it is seen as part of a larger group, and the "natural", presumedly homogenous and inalterable characteristics of the group are ascribed to the respective person. By contrast, renaturalised ine-

<sup>13</sup> Similar debates have recently surfaced in Germany, especially with regard to (secret) DNA-based paternity testing and the so-called "genetic fingerprint".

<sup>14</sup> What is new here is that these ambivalences and uncertainties are the *results* of modern biomedicine itself rather than the consequences of a *lack* of "exact" scientific knowledge.



qualities follow a quite different pattern: they aim at a person's *individualised* body which is by no means regarded as stable and inalterable, but increasingly as flexible and shapeable. It can thus be attributed as an acquired characteristic. This fundamental difference between "naturalised" and "renaturalised" inequalities becomes very clear with regard to a shift in the meaning and role of cosmetic surgery over the last few decades. As Sander Gilman has shown, aesthetic surgery served for a long time as a means of rendering invisible physical features (such as an "Irish" or "Jewish" nose) that were used by dominant groups to stigmatise or exclude certain minorities. "Moving into and becoming invisible within a desired 'natural group', was the objective of the surgical procedure (Gilman 1999: 22). In this context, it is important to notice that "the nineteenth-century 'Jew' who desired to be a 'German' assumed that 'German' was a real category defined in nature rather than a social construct" (ibid.) Certainly, current cosmetic surgery still serves as a means of covering or removing undesirable physical features that supposedly do not fit the "norm". Yet, it does not primarily aim at escaping from collective identity constructions and discriminations, but instead suggests a positive shaping and optimisation of the respective individual self, however much that may be an illusion. This holds particularly true in the case of women who, in the eyes of men, are of course regarded as members of a (putatively inferior) collective group and thus placed into a "constant condition of bodily insecurity" (Bourdieu 2005: 117). Nevertheless, even in this case the use of cosmetic surgery does not aim at denying or making invisible the individual woman's relationship with the "natural group", nor does it help to break the dominant patterns of perception. Feminist authors justly see this as "the dilemma of cosmetic surgery" (Davis 1995). "The limitation of cosmetic surgery is that it offers a technological solution to a social problem." (Negrin 2002: 25)

The promise of emancipation from the "naturally given", together with that of individual self-optimisation, is – per-

haps surprisingly – also connected to predictive genetic testing. Genetic dispositions can of course not simply be done away with, but genetic testing goes along with both the promise and the social expectation that the people or families affected will adapt their lifestyles to their genetic constitutions (cf. Hallowell 1999; Conrad 2002; Lemke 2004). Under favourable circumstances, this may lead to the emergence of what Paul Rabinow has termed "biosocial" communities, for example self-help groups or patients' associations that meet on the basis of a common genetic diagnosis in order "to share their experiences, lobby for their disease, educate their children, redo their home environment, and so on" (Rabinow 1996: 102). What Rabinow links with the term "biosociality" is the ultimately optimistic expectation that, in the future, culture will no longer be "biologised" (as in sociobiology) but, in contrast, nature will "be modeled on culture understood as practice" (ibid.: 99). "Nature will be known and remade through technique and will finally become artificial, just as culture becomes natural." (ibid.) The results of this "overcoming the nature/culture split" (Rabinow) will probably be more ambivalent and questionable than Rabinow seems to be aware. Especially in the case of genetic testing, the "socialisation" of nature (denaturalisation) is likely to be outweighed and countered by a simultaneous "biologisation" of society (renaturalisation): "Culture invades nature, while from a dialectical point of view it becomes more and more 'naturalized'." (Bertilsson 2003: 119)

The tendency to renaturalise social inequalities does not make individuals subject to a fateful (collective) nature. Quite the contrary: they are supposed or even forced to be responsible for their "natural" or "genetic" fate on their own. Nevertheless, one should not draw too sharp a dividing line between the "old" and the "new" forms of inequalities based on natural categories. The fact that the insertion of an additional palpebral fissure to make the eye bigger and "more Western" is one of the most popular surgical procedures in the People's Republic of China (Gilman 1999: 98ff.; Maass 2004a),

illustrates that the optimisation of the individual body and the adaptation to hegemonial, "racialised" body images and norms may overlap and even reinforce each other. Rabinow points out a somewhat different potential interaction: "In complicated and often insidious ways, the older categories may even take on a renewed force as the new genetics begins to spread not only in the obvious racism so rampant today but more subtly in studies of 'blacks', alleged to have higher susceptibility to tuberculosis." (Rabinow 1996: 103)

The normative self-perception and institutional practices of modern societies have hitherto been based – more implicitly than explicitly – on a remarkable arrangement of natural differences and social inequalities that is by no means self-evident but rather fragile. According to this modern arrangement, natural differences among humans are seen as inalterable (or alterable only to a very limited degree) but at the same time contingent and not subject to the responsibility of the individual person. Biological inequalities and "injustices" are taken as given (or had to be taken as such for the lack of technical options). But exactly for this reason, it is even more urgent that their importance for (and influence on) social life should be restricted and "neutralised", as Rheinberger (1996) has put it, for example by introducing anti-discrimination policies. Where neutralisation is not possible, there should at least be compensatory measures on the part of the welfare state.<sup>15</sup> The new scientific and techni-

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<sup>15</sup> How fragile and contested this arrangement actually is, is highlighted by current political and philosophical debates that aim at a discursive "renaturalisation of social inequalities" (Große Kracht 2004). One striking example is the ethics of natural merits (*verdienstethischer Naturalismus*) recently outlined by the philosopher Wolfgang Kersting. According to Kersting, contingent differences in the natural constitution of individuals are nevertheless attributable as a merit. There is thus neither a right to compensation nor a duty to neutralise or compensate for resulting social inequalities (Kersting 2000: 369-71; cf. for a critical discussion Große Kracht 2004).

cal options of "body improvement" (Schlich 2001) seem to open up this arrangement: physical inequalities (even where they are far from being diseases or handicaps) are increasingly being "corrected" technically, instead of being politically neutralised and weakened vis-à-vis their social consequences. As Llewellyn Negrin following Gilman states, the advent of cosmetic surgery has shifted the modern expectation of personal development and self-transformation: "(T)he enlightenment belief in the ability of individuals to transform themselves, which has been articulated as a social and political task, came to be redefined in biological and medical terms." (Negrin 2002: 25). To a hitherto unprecedented extent, the biological constitution of individuals becomes a direct object of no longer mainly therapeutic but increasingly *optimising* medical and technical interventions (Council on Bioethics 2003). It is a seemingly paradoxical consequence that at the same time a manufactured "nature" is progressively established as a legitimate medium of social distinction and discrimination. What is more, the economic resources to participate in the benefits of body improvement are still distributed in a highly unequal way.

The arguments that only emphasize the increase in individual autonomy due to these new developments (cf. for instance Birnbacher 2002; Kersting 2002) negate the other side of the coin, namely the emergence of dominant new norms of behaviour as well as of new social inequalities. The negative flipside of "defatalisation" (Kersting) consists in expanding pressures and demands for the optimisation of the individual body or, at least, for the adaptation of one's lifestyle to one's "natural" genetic constitution. The emancipation from the natural body and its inadequacies merges in the self-subordination to the social norm of body enhancement.<sup>16</sup> Obviously, the given physical nature of humans – be it considered normatively inviolable or factually immutable – no longer serves as a boundary for technical manipula-

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<sup>16</sup> This is most visible in the doping scandals of professional athletes.

tion that should not be transgressed. "When nature no longer provides human society with its boundary conditions (for normal practices), where will they be settled?" (Bertilsson 2003: 119) Whether and how it will be possible to establish new, socially accepted, and institutionally stabilised boundaries for the interacting dynamics of denaturalisation and renaturalisation of individual differences and social inequalities turns out to be a key question for the present "reflexive modern" societies.

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