

Teresa, where are you?

The creation and study of a historical figure

Staale Sinding-Larsen

*The Norwegian University of Technology
and Natural Sciences (NTNU)*

<http://folk.ntnu.no/staaesl/books.html>

*In memory of years at the Vatican Library
under the expert and kind guidance of the Prefect,
Rev. Leonard E. Boyle, O.P., staunch protector of
the treasures of this exceptional collection (who
will probably not endorse my ideas presented here).
And thanks to Liv who took me to Spain and to new ideas.
And to Knut Rø, who makes my publications
technically possible*

*Publication with no copyright claims, may be freely copied and
distributed*

Trondheim and Rome 2012

Qu'on dise: il osa trop, mais l'audace était belle
(Sainte-Beuve, 1828)

Preface

This is an exercise in methodology and theory rather than a substantive contribution claimed to be the right one. *Part IV* will be developing so-called interdisciplinary perspectives, for which I prefer the name *open-source*.

My notes on Bernini's space constructions probably are not as "original" as they may look. In a field with so much scholarly coverage, it is impossible to claim priority. What is important to me, is the framework in which, as I see it, they may be integrated.

At the end - I do not say *conclusion* - of my observations on *St. Teresa de Ávila* and her surroundings, I am going to develop some ideas regarding what I call *n/Systems* and *r/Systems*, the former classically built on quantities such as *numbers* (hence the *n*), the latter built on *reflections* (hence the *r*) from classical-type systems over to complex cases that elude quantification and related systems paradigms, processes without definite beginning, midpoints or endpoints, devoid of time marks except in ordinary or trivial sense, such as documented attitudes and ideas. I shall speak of the procedure of working out such a reflection as a *systemization*.

Some readers rightly will say that I have made things more complicated than necessary. And yet, if one's assignment is to study *how to handle complex matters*, then there is no way to avoid that. I must aim at articulate argumentation rather than elegance. The world, we know, and our lives, and thus also in historical contexts, are complex because cognition, conceptualization, idea, goals, interests, as well as unsurveyable social, political and economic factors, enter into the picture.

A publishing policy for our time

Leave the traditional stuff to the publisher market, use the *Internet* for critical approaches to theory and procedure, not intended to come up with definite results or solutions. Alert readers will quickly see if the stuff is worth considering; no reason to pay more or less competent "readers" for that.

Homepage (bibliographical not biographical):

<http://folk.ntnu.no/staalesl/staalesinding/iconography.html>

Furthermore, for publications after 2009: *Patterns and programs in premodern Rome*, with further bibliography: <http://ntnu.no/bht/arkitekturhistorie>

E-mail: staale.sinding-larsen@ntnu.no

Cell phones: Norway: +47 95034683 - Italy: +39 3337204345

Text, graphics and math formula: *Adobe FrameMaker, book program*.

Table of contents

Part I TERESA IN SPAIN 1562 AND IN BERNINI'S ROME 4

- 1.1 Frameworks for an individual 4
- 1.2 Deliciously being shot at 5
- 1.3 Bernini's chapel 7
- 1.4 Conversations 9
- 1.5 Teresa and her social standing 12
- 1.6 Teresa and the heritage from judío-conversos 16
- 1.7 Teresa and her honra 18
- 1.8 Teresa's Libro de la vida and its language - leaving us in doubt 19
- 1.9 Fearing the frailes 21
- 1.10 Teresa manager 24
- 1.11 Snobs in seclusion 26
- 1.12. Using relevant sources 26
- 1.13 History 27

Part II TERESA IN THE VATICAN 1622 28

- 2.1 The Canonization of 1622 28
- 2.2 Teresa on October 15 32
- 2.3 Returning to the Breviary 33

Part III VIEWS AND VISIÓNES 35

- 3.1 In the shadow of the sobrenatural 36
- 3.2 What Teresa saw 40
- 3.3 Seeing things 42

PART IV INDETERMINACY 45

- 4.1 Probable pictures 45
- 4.2 Picturing the event 45
- 4.3 Procedural and associative values and models 47
- 4.4 Systems and imponderabilia 48
- 4.5 Systems application 50
- 4.6 Challenges 51
- 4.7 Uncertainty 52
- 4.8 Making systems work 59
- 4.9 Taking apart 62
- 4.10 *Theories of consistency*
- 4.11 Humanities and Sciences 63
- 4.11 Limitations 64
- 4.12 The Open-Source Program 67
- 4.13 And Teresa? 68

Part V SUPPLEMENTS AND BIBLIOGRAPHY 69

- 5.1 Teresa according to the Breviary 69
- 5.2 BIBLIOGRAPHY 71

Part I TERESA IN SPAIN 1562 AND IN BERNINI'S ROME

1.1 *Frameworks for an individual*

Teresa, where are you; which one are we facing? The question arises the moment we visit the spectacular Roman chapel dedicated to her and created by Bernini for a family from the Venetian nobility, the Cornari, in *Santa Maria della Vittoria*, Rome. But if the subject is *Teresa de Cepeda y Ahumada* (posthumously *Santa Teresa de Ávila* or *de Jesús*; from now on just *Teresa*, who died in October 1582), how can one ask such a question?

If we read her autobiography (*Libro de la vida*, definitive text in the edition of 1562; from now on just *Vida*; furthermore *Las moradas* of 1577, and *Las fundaciones*, 1576) as the personal presentation of her, then we have two of them.

But there are *three*, the third one as her person emerges in the authorized biography in the *Breviary* for her feast day, 15 October, an account edited in connection with her canonization in 1622 under Pope Gregory XV (1621 - 23) (*Part II*).

The *fourth* Teresa is of course the one emerging from modern scholarship, which I shall be relying on in what follows.

One important topic on the agenda is her *social standing* (see 1.5). Santa Teresa is reputedly a prominent *historical person*, so that an investigation of her materializing in various descriptive and commemorative media may highlight some perspectives in the *academic discipline of History* (see 1.13 and *Part IV*).

She was “ordered” by male clerics to write and publish her books, being a woman and one afraid of being under supervision by the Inquisition.

In her autobiography, *Libro de la vida*, we seem to meet her directly. But this of course is not so, since the book evidently was meant to guard her against potential enemies, and because much of what she says is open to different interpretations. An autobiography is written with a purpose (or a number of purposes), basically that of presenting oneself to the world and to some specific readership. Often, an autobiography is an *apologia pro vita sua*. In Teresa's case, the constantly repeated address to her nunnery audience, indiscriminately as *hijas* (daughters) and *hermanas* (sisters), leaves the options open: is this a confession or a text book? A question to be left hanging till Part III.

The impression I obtain from reading Teresa's works, is of an individual whose every written word was consciously, even politically, selected with the purpose of positioning herself advantageously.

Nine themes may be emphasized in terms of what she spent her life *doing*:

- Writing numerous books, most importantly the three works discussed below, *Libro de la vida*, *Las moradas*, *Fundaciones*;
- the populist and somewhat shaky language she uses in her writings (1.8).

- her account of her childhood and youth and her family background and circumstances;
- her continual “conversation” (in the theological sense of the term) with God (1.4);
- her constantly committing sins and offending *su Majestad*, God;
- her almost continuous insistence upon her *honra* (for this term, *see* 1.7)
- her spiritual experiences and “visions” (*Part III*);
- her founding of nunneries and convents (a number of them);
- her generally good but at times troubled relationship with her confessors.

A critical discussion of the structure of *Part I* in 4.10, *Taking apart*.

I shall change this choice of items and its order, since, for example, the subject of her *honor* and her Jewish heritage is exploited in order to adjust the picture of her social status of her personality, indirectly of what she achieved and of her spiritual experiences and visions. Since the entire *Vida* is kept on a “spiritual” level while invoking the same very few specific conditions and connotations, the biographer (modestly, myself, in this context) will face the challenge that *everything is mixed up with everything*, making repetitions in my account unavoidable. It runs as a continuous theme through her account that she continually commits sins, that God in his goodness supports her spiritual life, while deepening her experiences by his keeping her almost permanently ill and miserable.

As is to be expected, contemporary and later reports about Teresa are colored by her importance. We read, for example (Teresa, *Las Moradas* - the dwellings -, 18ff.; written between 2 June and 29 December 1577), that one Father *Diego de Yepes* met her at Arévalo, on which occasion she told him of the *interior castle*, an idea subsequently developed all through her *Moradas*. But the cross-roads indicated for their encounter does not fit the routes between the indicated places, so Yepes’ account, which contains other contradictions, too, is somewhat idealized. Is it a tale he told after she had become important, and motivated by what must have been considered a great achievement of hers, writing *Las moradas*, and a great qualification of his, having met her and discussed the project with her - a reflected glory?. The story of the event might have been thought to confer attractive and complimentary attributions on Yepes himself, tempting him to elaborate a bit. He recorded the event in his *Vida, virtudes y milagros de la Bienaventurada Virgen Teresa de Jesús*, published in Madrid, 1587, about five years after her death; but long before her canonization in 1622.

1.2 *Deliciously being shot at*

Bernini's Santa Teresa Chapel (1644 - 52), is in the *descalzas* church in Rome, *Santa Maria della Vittoria*. The striking feature is Teresa about to be hit by an arrow thrown by an angel, *Divini amoris cusptide*, as the Breviary expresses it (the *Breviarium romanum*, from now on, just Breviary; I am using the edition of Malines, 1876.).

In Spanish representations this event is reduced to her holding the arrow as an attribute - a wooden statue of just before 1620 has her holding the book, too (http://www.cervantesvirtual.com/bib_autor/santateresa...). Other images represent her reading or writing, facing us while the Holy Spirit appears, and on her death bed; all of them standard images of saints, especially female ones.

Assembled *in effigie* on balconies for Mass participation in their patronage chapel, with the congregation in front of the altar, the *Cornaris* do have something impressive to fasten their eyes on, while the Breviary recital teaches them and the congregation about the things they are seeing. The recital on October 15, her day, also confirms that the saintly figure in front of them had been, like themselves, is of acceptable origin (*parentibus tum genere, tum pietate praeclaris*, *Supplement*, No. 35).

Bernini's figure shows her being hit in her heart by *an arrow hurled upon her by an angel*, and she heard Christ calling her his bride.

The authority for this scene is the *Breviary* account quoted in full in my *Supplement* (with verse numbering) on her being hit by the arrow. Here the directly relevant passages run as follows.

- *For death is milder to you, penance sweeter; fainting being stabbed and wounded by the javelin [spear, lance, arrow] of divine love - Sed te manet suavior Mors, poena poscit dulcior; Divini amoris cusptide In vulnus icta concides* (6 - 9).

- *Her heart burned in the fire of divine love so that she was rewarded by an angel who pierced her body with a flaming arrow [or similar], and she heard Christ calling her his bride - Tanto autem divini amoris incendio cor ejus conflagravit, ut merito viderit Angelum ignito jaculo sibi praecordia transverberantem, et audierit Christum data dextera dicentem sibi: Deinceps ut vera Sponsa meum zelabis honorem* (43).

Without attempting a deeper exegesis, we can at least note that the following three features are present in both texts: 1. burning or hurting divine love; 2. which caused a pointed instrument to pierce her deeply; 3. a sequence completed by Christ favoring her.

Now let us scan her *Vida* to see how she herself told the same story. In fact, she tells it several times and lets us understand that the event was repeated on more than one occasion (numbers refer to pages in the cited *Vida* edition). The novelty, if there is one, consists not in her experiences but in the fact that she reports them autobiographically, in a realistic account that, *mutatis mutandis* reminds one of

Lazarillo de Tormes (1554), but without its Stendhalesque economy. Indeed, the *Vida* is almost unreadable on account of its frequent repetitions.

On one occasion (p. 351), she is hit several times by an arrow which pierces her entrails and heart, so that the soul loses conscience; and the arrow seems to carry poisoned herbs to make her detest herself and love God and be willing to give her life for him: *hincan una saeta en lo más vivo de las entrañas y corazón a las veces, que no sabe el alma qué ha ni qué quiere. Bien entiende que quiere a Dios, y que la saeta parece traía yerba [= hierba, poisoned herbs] para aborrecerse a sí por amor de este Señor, y perdería de buena gana la vida por Él.*

Later on in her report, she tells us how she saw angels in heaven; one of them taking care of her. *I saw him hold in his hands a big arrow/dart of gold, and at the iron point it seemed to carry fire [a feature not exploited by Bernini, who preferred - or his commissioners? - a simple arrow shape]. This I felt he stuck into my heart several times, so that it penetrated my entrails. Tearing it out, it appeared to extract them and this left me entirely burning with great love of God. The pain was sweet, and it is not a bodily pain but a spiritual pain, even though it did hurt physically too, and hard enough. It is such a graceful link between God and the soul: Veíale [scil., the angel] en las manos un dardo de oro largo, y al fin del hierro me parecía tener un poco de fuego. Éste me parecía meter por el corazón algunas veces, y que me llegaba a las entrañas. Al sacarle, me parecía las llevaba consigo, y me dejaba toda abrasada en amor grande de Dios. Era grande el dolor que me hacía dar aquellos quejidos, y no hay desear que se quite, ni se contenta el alma con menos que Dios. No es dolor corporal, sino espiritual, aunque no deja de participar el cuerpo algo, y aun harto. Es un requiebro tan suave que pasa entre el alma y Dios...(p. 353).*

The three themes we noted in the Breviary are developed in the *Vida* in a more personalized direction, as is to be expected in an autobiography, and here we are told about the *coincidentia oppositorum* between physical and spiritual experiences. She feels frequently that she is “burning” under the impact of her spiritual experiences (e. g., *Vida*, pp. 364f.).

1.3 Bernini's chapel

In Bernini's chapel, the event takes place in celestial perspective at the presence of the Holy Spirit and angels. On each 15 October the congregation would hear that she was hit in her heart *Divinae amoris cuspage*, by the lance of divine love. The heavenly manifestation has a twofold reference: to the saint hovering in mid-air, and directed on the celebration of Mass at the altar (standard liturgical texts and details in SL, *Iconography and ritual*, pp. 21 - 26).

A fatal misunderstanding in some contributions about imagery in Roman Catholic chapels and churches is to isolate the artistic products from the rest. With "the rest" I do not mean only the visual surroundings such as architecture, decora-

tive features and furnishings. Static representations assume the character of pictorial sequences in terms of accompanying ritual processes (SL, *Burden*).

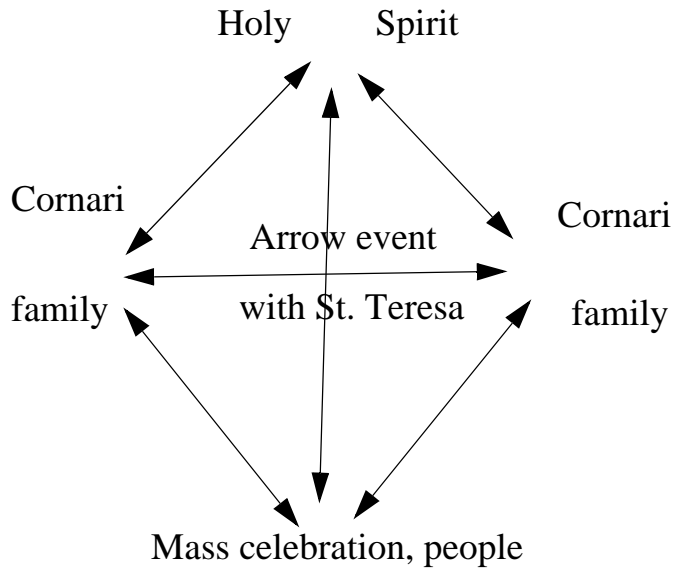


Fig. 1. Feature pattern in the Teresa chapel

The chapel is not endowed with its full meaning without counting in the celebration of Mass. The chapel composition, as we see it directly, is perfectly at equilibrium, with the *four main features* weighted against each other in a pattern that is dynamical in only one sense of the term: the canonically defined dynamics in the implied and under-

stood sense of active relationships between the Arrow event, Heaven with the Holy Spirit and angels, the celebration of Mass at the participation of a congregation (or, at their absence, the celebrant), and the Cornaris. On the altar frontal, the Last Supper.

Later (4.2) I shall develop this model, taking into account the interaction patterns.

Now a closer look at the Teresa figure itself.

We constantly see saints in their heavenly existence being accompanied by the signs of their terrestrial merits acquiring divine recognition. Being hit by the arrow by Christ or his angel is thus a property attaching to Teresa and one of her merits (cfr. her *meritus*, verse 43), for which she is received into heaven, a merit vested in the canonically defined *thesaurus* (SL, 1984, 21; Denzinger-Schönmetzer, *Enchiridion*, J10ba: *thesaurus meritorum*).

The buildup of the Teresa chapel relies on a century-old usage. A saint can be depicted hovering in midair, being located in heaven, possibly being assisted by angels, or, as in Pinturicchio's *San Bernardino fresco* in the Araceli church in Rome (1486), standing in an "exalted" position in a Paradise landscape; angels placing a crown upon his head; a representation adhering to an established iconographical tradition. Other works by Bernini, such as the chapel of the *Beata Ludovica Albertoni* in San Francesco a ripa in Rome, are also structural modifications in spatial terms of traditional models (SL, *Patterns*, 2.2.9).

From the *spatial* point of view, Bernini's Teresa chapel differs from the frescoed chapel, because the configuration of the arrow event has been lifted out of the flat surface of a fresco and extended so as to occupy an entire chapel; a result, partly, of new *patron economics*.

Teresa, we have seen, describes in detail what happened: she felt the arrow, and this caused a spiritual pain which spilled over into her body; a common kind of experience. The *supernatural* quality is substantiated by the notion of *Christ's intervention*; this, however, is of the kind that had been recognized regarding many saints back to the conversion of Saul into St. Paul (pictures of Christ appearing in the sky above Saul falling off his horse). The fact that this sort of event in the seventeenth century became a literary topos should not lead us into believing that something new was afoot. In a long-term response to Protestantism, intensifying the show of sainthood was a valid component.

The 1999 Bernini catalog (Bernini, in the *Bibliography*) speaks of Bernini's Teresa as being *in estasi*. By the traditional method, a crucial event in a saint's life is *pictorially* transposed to the celestial level, thus providing the congregation with a significant record of her or his merits and an emotionally appealing focus object for their veneration. But *ecstasy*? Let us return to the subject at the end of Chapter 3.4, *Picturing the event*. The different inputs can be analysed on a *configurational matrix* (not a math one), to be presented under the same heading.

1.4 Conversations

In Chapter XXV of Teresa's *Libro de la vida*, we find a long description of her "talk" (*hablar*) with God, using formulations, according to Chicharro, that are common also in writings by Juan de la Cruz and Tomás de la Cruz. Words are communicated to her that are *muy formadas* (very definite, highly articulate), while not captured by one's physical hearing but which are understandable even more clearly than if they had been heard directly.

All though her *Vida*, an interchange between two is being played out, Teresa and God facing each other in conversation (cf. the notes by Castro, p. 580: Teresa and Juan de la Cruz sought *human*, read: direct, contact with God (*buscaba refugio y razón de existir humanamente [emphasis] en Dios, dejando a un lado los usos del vulgo y, a veces, los razonamientos de los teólogos*).

Conversation with God is common in monastic traditions (Penco, 283f., 286, and, generally, his Chapter XV). Penco, in consonance with Tradition, looks at it as basic for the expressly professional (theological, moral-related) *conversaciones* between the members of a monastic or other religious orders. The term of a *conversatio* with some *licentia poetica* has been applied to pictures with a two or more saints flanking the Virgin or Christ: a *sacra conversazione*, since the central figures will have been their preferred subject.

In her *Vida* (p. 306), she writes that she heard Christ tell her not to converse with humans but with angels (*Ya no quiero que tengas conversación con hombres, sino con ángeles...*). Generally, we have seen, she addresses God and feels the is receiving his response; a normal occurrence. Here, she is told by Christ to con-

verse on the celestial level. She could hardly get closer to declare her own future sainthood, but apparently not closely enough to trouble her confessors.

This ancient tradition persists. On 9 March 2012, in the convent of Santa Francesca Romana, Rome, on her day, small cards were available, with an image of her and her angel and the statement, culled from the Breviary, that God had enabled her to entertain intimate conversation with her Guardian Angel (*conversare familiarmente col suo Angelo Custode*).

The entire *Libro de le vida* is focused on God, but not in the theological sense (as in Ignacio's work; see Rahner, in the *Bibliography*), rather in the autobiographical perspective. *Thus no theology*. This probably would have been considered off limits for a woman. Let me risk a comparison with *La Celestina* (1499) by Fernando de Rojas (Rojas, I in the *Bibliography*): *the ideological conflict between <human> lives is all that happens (el choque dialogado de vidas es todo lo que sucede...; Gilman in Rojas, I, p. 13)*.

Nordic people, like myself, used to another religious denomination, tend to look at theology as a literary exercise; a notion that is not at all applicable to the Roman system. Roman theology is a complex but coherent system; provided some fundamentals are understood and accepted.

A nun, a *female*, did not have the same opportunity as for example Ignacio de Loyola, to *formulate* theological truths (Rahner, *Ignatius*, being a classic introduction); she could only *presuppose* them; which could be dangerous enough. A man had better opportunity of publishing canonically correct writings that might save him. But Teresa was a woman and knew it and, even worse, of *conversos* origin - and tried to grapple with it. Insisting on her *honra* was one of her arms (see 1.7). She makes a show of not being an intellectual (to use our term), something at that time normally not expected of a woman. And all through her *Vida* she consistently gives a modest picture of her capacities, apparently in defence of her position in the face of threats from the Inquisition (see 1.9). She seems to try to adjust this image of herself with her insistence on her predilection for and close communication with the *Jesuits* (e.g., on pp. 295, 298), a highly rated intellectual and disciplined society numbering important scholars such as Bellarmino and Clavius (Schlüssel) at the famous *Collegio romano* (for which see SL, *Patterns*, 22,10 - 11 and 12).

Teresa herself and her entourage appear untouched by the deeply disturbing dogmas regarding *Trinity theology*; she needed a relatively peaceful life, *malgré-soi*.

It was a big misfortune for the Church to have turned the most slippery and feeble concept into one of their deepest and central dogmas: that of the Trinity. The Spanish nobleman and scholar, *Miguel Servet*, in 1531 published his revolutionary *De Trinitatis erroribus* (*The mistakes concerning <the dogma of> the Trinity*; Tolstoy, too: having *The Three Hermits* praying *Troye Vas, troye nas: You*

are three, so are we). To punish Servet as an heretic, the Roman Church burnt him *in effigie*, the one led by Calvin burnt him physically (Bainton, *see the Bibliography*).

The embarrassing fact was that the Trinity is mentioned only once in the *Biblia complutense* accepted by Rome, in the so-called *comma johanneum* (1. John, 5: 7 - 8); and that this passage had been interpolated later and in response to Arianism. The editor of the Italian version of Bainton's book, Adriano Prosperi, notes that Delio Cantimori, too, had made this observation, in his book *Eretici italiani del Cinquecento* of 1939. Of course the Church can always claim that she is the depositor of truth and the only authorized reader of the Bible, because she is guided by the Holy Spirit.

Semantically and rationally speaking (whatever that may mean) we must conclude that Servet demolished or rendered shaky the entire edifice, with three main currents plus undercurrents of argumentation, built up through the centuries in order to explain the *Trinity dogma* as it had originally been drafted (Nicea 325, Calcedon 451).

Bellarmino, I remember having read in one of the volumes of his *Controversiae*, trying to be objective, praised Jean Calvin for his execution of Servet. Here we must distinguish between the cruelty of the action - to us utterly to be rejected - and the principle of its being done. Bellarmino's attitude can stand for many comparable cases. He must have seen that a widespread instability of a central dogma of the Church, would put great numbers of people out of their peace of mind, besides, of course, reducing the authority of the Church. Substituting for Paul Feyerabend's *He had no choice*, I would submit: *He saw no choice*. People could practice their religion without entering into deep debates (emphasized by Erasmus of Rotterdam, as quoted by Bainton, pp. 23f.), much as they will do regarding political convictions. Charitable work, like that of today's community of *Sant'Egidio*, could continue their splendid work among the poorest (taking care also to support their human dignity) and the Cardinals could safely go on quarrelling among themselves over worldly issues, all without involving themselves in wrangles on definitions. So Teresa could go on without involving herself in complex theological questions. And Spain, a rigidly structured society, despite a few years of aborted approaches to the teachings of Erasmus of Rotterdam, and controlled by the Inquisition, went untouched by the disturbances just cited.

She had good reasons to contact God, for most of her actions and thoughts, according to *La vida*, seem to have involved her in sin.

Not only is God always available (that is the assignment of many gods in many religions), but he always responds, and Teresa seems to be in a privileged position since she is able continually to offend *su Majestad*.

But the relationship has its inverse side also. Whatever might be done successfully, is his doing; she, according to herself, not having done anything but sin-

ning. One of the lines running through her *Vida* is exactly this, sinning and offending the Lord, so from this point of view the book lines up with all the confessions that have peopled literature since Augustine, whom she read early in her life. Chicharro notes (note 2 on p. 156 in the *Vida*) that Teresa indulges systematically in hurting herself. She repeats the accusation of leading a sinful life almost everywhere in the entire work (*Santa Teresa gusta sistemáticamente de autoinjurarse. Repite la acusación de su "ruin vida" a lo largo de toda la obra...*). Of course, by insisting so much upon her sins and other shortcomings, she achieves the opposite effect, and she was intelligent enough to know that.

Teresa not being closed inside a convent in *clausura* left her unprotected against temptations but also, as we may imply, against a society actively alert about her dubious lineage. Her self-proclaimed temptations were of such a finicky sort that a modern reader is hard put to be impressed by them; but of course the opportunities for recordable sinning available to her were rather scanty. It seems to transpire from her account, however, that she was conscious about her own imperious nature and consequent tendencies to what she calls *vanagloria* - and that she was intelligent enough to understand the problem of claiming *honra* without infringing the state of innocence. This seems to have been her main concern regarding her sinning. Probably a normal enough human predicament, were it not for the fact that her sinning goes on for some 350 pages.

She was a woman in sixteenth-century Spain. Some decades later, Spanish comedies, picking up age-old traditions, tell us that a woman is born in order to honor and adore a man; not surprisingly, we might say (for example in Lope, *Peribáñez, acto primero*, verses 408 - 447; of the year 1614).

1.5. Teresa and her social standing

The Breviary offers the basic public biography of Saint Teresa, in which her dubious (by the then accepted norms) lineage is touched up, claiming that Teresa was *parentibus tum genere, tum pietate præclaris*. In fact, by the official standards of contemporary Spain, they were not, being of Jewish *conversi* origin. But the reading had to back up the canonization in 1622.

This quasi-ennoblement must have been a precondition for the Cornaro family having themselves kneeling *in effigie* on either side of the chapel. In agreement with the ecclesiastical adjustment of her genealogy, in the ecclesiastically sanctioned Italian translation of her writings, of 1969, we are told that her parents were *nobili* (*Il libro della vita*, ed P. Egidio di Gesù, Introd., translated from a Spanish work). Such a publication, in order to obtain the ecclesiastical *imprimatur*, had to conform to the Breviary and to the intentions behind the canonization in 1622, which, in its turn, reflected contemporary custom, to select the saints from the upper echelons of society.

The recent literature on Teresa's *Librio de la vida* is cited in Chicharro's *Introduction*. All seem to agree that the book, apart from being an account of spiritual experience and religious enterprise (founding and instructing convents; more specifically in *Las Moradas*), was written with a third, more personal purpose. As hinted already, to a considerable extent, the book is dedicated to silently implying, occasionally hinting at, a better social heritage and status than contemporary society would really accord her. The word *honra* (*honor*), Chicharro notes, occurs with impressive frequency in her *Vida*. Posterity did mean something next to eternity (*see* 1.7).

Contemporary readers of the *Vida*, also in Italy, could with ease take her implications and hints as an expression of suitable modesty. She was "only" a woman; in her book, she is careful not to cross the boundaries that society set for her sex. The authorities of the Church and the classes allied with them could use the *Vida* and the configuration of the author herself more efficiently for their special purposes by her taking such a line. As in other comparable cases, she was turned into a model for saintliness, a transformation sanctioned by the Breviary.

Teresa's social position, a subject that runs under the surface through most of her *Vida*, must be integrated in a wider view of Spanish society. She was known or suspected for descending from converted Jews, belonging to the class of *conversos*, not being a *cristiano viejo* (Old Christian), and hence could not brandish a "clean blood" (*limpieza de sangre*).

Her insistence on her *honra* makes the question of her social classification urgent (continually on her *honra* in the *Vida*, e. g. pp. 126f.). Living as she did in religious institutions, founding some of them, in which, let me repeat, both male and female members (in her case, novices, nuns and confessors) were all of them upper-class; she was surrounded by a rigidly layered society, a burning issue was her origin and lineage, descending from Jews and hence belonging to the critical denomination of *conversos* (Edwards and Lynch has much information on the issue, *see* their *index*, s. v. *conversos*; details in Chicharro and in most Spanish publications concerning the post-1492 time; also in Calderón, pp. 25ff.).

Let us consider the framework into which her life and work have to be integrated.

In 1492, the royal couple, Don Fernando and Doña Isabella, expelled from the country all Jews unwilling to convert to Christianity, thereby destroying a flourishing culture of learning and financial expertise and enterprise (and ruining the country's economy and commerce). Pope Alexander VII Borja, himself a Spaniard, granted them the title *Reyes Católicos*. Etymologically *catholic* means embracing, being of wide range, even broad-minded, but in the present case the term acquired the opposite, restrictive sense. The royal couple and their entourage, tied as they were to the Spanish political, social and economic system, did not accept or understand the cultural, social and economic value of the Jewish commu-

nities, nor indeed their traditions from the time when *scriptoria* at Toledo, manned by Arabic-speaking Jews, had translated Greek Classical scholarship, preserving it for Europe (the so-called *Twelfth-Century Renaissance*).

Spanish society, on the organizational level was firmly, by tradition and by decree, established as a class-distinguished society, the hierarchical structure of which was attributed to God and guaranteed by his representative, the king, with few opportunities for anybody moving upwards in the ranks. Marín in his *Introduction* to Lope de Vega's *Peribañez*, originally published in 1979, contributes a survey (pp. 17 - 29) on social conditions and the role of *honra* in Spain in the seventeenth century, which had been re-established in the second half the sixteenth, referring to a number of special studies by such authors as Castro, Herrero, Jones, Maravall, Ortíz. So he does also in his edition of Lope's *Fuenteovejuna* pp. 13 - 20; Estrada, in his edition of this work gives details concerning the historical event, an uprising against and killing of the local lord, and its socio-political implications (pp. 19 - 36).

The idea of distinct social classification is Christian and goes back through European history. The story of *Noah's Drunkenness* was claimed in support for the idea, which was developed by the political theorists, according to which society became divided in lords and servant by divine decree (references in SL, *Patterns*, 1.6.1; I noted this concerning the corner sculptures on the Doge's Palace in Venice; in SL, *Christ in the Council Hall*, 1974). The English *Book of Common Prayer*, adhering to tradition, told the congregation, echoing a central point in medieval political theory, that it was accordingly structured. For *He made them high and lowly, / and ordered their estates*. This traditional socio-political theory eminently matches Spanish society, with its inflexible structure considered as a manifestation of God's will.

Monasteries and nunneries were populated almost exclusively men and women of high social standing, whether *cristianos viejos* or *conversos* (details in Chicharro, introduction to the *Libro de la vida*). It was only in 1597, five years after Teresa's death, that *limpieza de sangre* was strictly upheld condition for being received into the convents. But by then, as Chicharro notes, the times and circumstances were different; read: anti-Semitism had become unyielding; while the convents needed money even more than earlier; one could "clean" one's blood officially by paying unofficially.

The alternatives were crucial, either of belonging to the vast category of old Christians, which included most *labradores* and peasants, or instead to the class of merchants and financial operators who were mostly Jews, and hence, as usual, at risk of being mistreated (Calderón, pp. 31ff.). Characteristically, it has been noted that *the lower the social status, the less likelihood of being Jewish (quanto más inferior el rango social, menos posibilidad había de judaísmo*; A. Castro, cited by Marín). Teresa's heritage inescapably hovered in the background, while occasion-

ally becoming front matter. Consequently, she insisted upon her personal *honra*; as a woman she probably was not in a position to buy a better standing to compensate for her - by the terms of her own time - dubious lineage.

Part of my documentation, as we have seen, is taken from the *theatre of the Siglo de oro* (very roughly the last quarter of the sixteenth century to the first three quarters of the next). How can I claim such pieces as “documentation” for events in the sixteenth century? I probably can, for here the performances are adapted to the social, political and religious conditions originating much earlier but still attestable, and in which the audiences were involved, with the purpose of the play being understood among the people at large (Santo-Tomás in his edition of Tirso’s *Don Gil de las calzas verdes*, pp. 17 - 39; and in his edition of Lope’s *Arte de hacer comedias*; Marín in Lope, *Peribañez*, 19ff., Estrada in Lope, *Fuenteovejuna*, 11)). The cited editors all assume that social and political conditions had remained more or less constant for a long time.

I am writing about *attitudes* and *ideas*, not about events. Observations by Canavaggio and Navarro Durán (Canavaggio, pp. XI and 4f.) and Jones, *passim*, and Wilson & Moir, *passim*, seem to bear me out. I would not claim that world realities were very much different from earlier epochs; only that on the conceptual level political, social and general cultural and scientific conditions generated changes in *the frameworks some people applied to their contemporary world*. To subsume these changes under the term of *fermentation* amounts to suggesting that in a network some links got disrupted, were reconnected in new topologies, that some nodes melted, diminished or disappeared, while some of them resurfaced in changed form or weightage (SL, *Patterns*, Part II).

According to the scholars cited here, the theatre of the *Siglo de oro* was an expression and an underpinning of the class society that had since long been established in Spain. The theatre presents things to be grasped at the moment, not to be mulled over as with a book. A precondition to *our* understanding approximating *theirs*, is of course that we to some extent succeed in capturing the historical conditions. As Marín insists in his edition of Lope’s *Peribañez*, we must realize that this is not a piece of social criticism as we might want it to be but rather a series of dramatic events intended to keep the *théâtre rempli*, as Boileau formulated it. Nonetheless, the performances mirrored social and political realities and ideologies; it is an indication of its role, not only that the returns from the *corrales* were used to finance hospitals of different kinds, but also that in 1598 they were closed by official decree.

Most experts (some of them cited here) agree that the theatre became so important politically and socially - and therefore also under strict control by the authorities and the Inquisition, because it proved an excellent medium for describing, supporting and confirming, but also tacitly censuring, the established social system with the King on top. Therefore, it is here - in works by Lope de Ve-

ga, Francisco de Quevedo, Luís de Góngora, Tirso de Molina and their colleagues - and in the related modern studies, that we may grasp the "worldly" intellectual and ideological conditions under which Teresa lived and worked.

1.6 *Teresa and the heritage from judío-conversos*

The issue of *limpieza de sangre*, having a "clean blood" (not Jewish nor Arab) is a constant preoccupation in Spanish literature in the sixteenth and seventeenth centuries (the very subject is repellent to us today, and the notion of race and "blood" of course just silly; but such considerations were an important argument in a strictly classified society like Spain; details in Chicharro and in most Spanish publications concerning the post-1492 time). Peribáñez' claim is typical (1614): *Yo soy un hombre / aunque de villana casta, / limpio de sangre, y jamás / de hebreá o mora manchada* - I am a man of the people, but of clean blood, never stained by Jewish or Moorish <blood> (Lope, *Peribáñez, acto tercero*, verses 947 - 950). We have noted already that Teresa belonged to a family of Jewish converts, the so-called *conversos* (Christians of Jewish origin). There is an informative chapter on *crístianos, judíos y musulmanes* in Edwards and Lynch, pp. 201 - 245; but, to repeat, it is in the works for the theatre that we find records of the *attitudes at community levels*.

The subject has entered modern historical novels, like Pérez-Reverte's *Limpieza de sangre*. Peribáñez' claim is typical (1614): *Yo soy un hombre / aunque de villana casta, / limpio de sangre, y jamás / de hebreá o mora manchada* - I am a man of the people, but of clean blood, never stained by Jewish or Moorish <blood> (Lope, *Peribáñez, acto tercero*, verses 947 - 950). Teresa's writings reflect this problem, especially so her autobiography, *Libro de la vida*, a book that will have to be regarded as having her social position as one of its major themes (Dámaso Chicharro, in his *Introduction to La vida*, pp. 19 - 92).

The matter is less definite than most contributions imply. There are disagreeing voices. One of them is Gilman's, in the Severin edition of Fernando de Roja's *La Celestina* (pp. 15f.).

Referring to Amerigo Castro (in a publication I have not seen), Gilman emphasizes the contributions in culture and scholarship of the *conversos*, who at the same time were a target for the Inquisition (*escritores, juristas, teólogos, humanistas e incluso santos*). The *conversos* did not make up a regular class but a *casta*, of people who played active roles in society while at the same time were excluded from it and regarded with distrust and antipathy (*una casta que era a la vez un elemento activo de la sociedad y a la vez estaba excluida de ella, mirada con desconfianza y antipatía*). At the same time, the numerous indefinite cases blurred the picture.

Teresa's identity as a *judío-conversa* made her nevertheless alert in both social and religious matters, worried about her social status and her *honra* and, par-

ticularly concerning possible suspicion that might arise in the Inquisition, afraid that her theological notions and ideas should be wanting in orthodoxy, hoping that her writings were *compatible with the truths of our holy Catholic faith* (*pues tanto me ha importunado escriba alguna declaración de las mercedes que me hace Dios en la oración, si fuere conforme a las verdades de nuestra santa fe católica* (Vida, p. 189; see Chicharro in *La vida*, Introd., 183ff., with a detailed discussion). Castro (p. 15) notes that the question of Jewish origin became a weapon of combat (*se convirtieron en armas de combate*; pertinent notes on the writings of the *cristianos nuevos* in the same book, pp. 350ff.).

Franch, in *Calderón*, pp. 27 - 32, discusses the social-political aspects of the alternatives between being *cristiano viejo* (old Christian) and being *converso* and the steadily recurrent subject of *limpieza de sangre*. He cites a literary protagonist admitting of being a poor laborer whose only honor consists of plow and hoe, *but very much Old Christian* (*muy cristiano viejo*; Franch, 27). Sancho Panza, in *Don Quijote*, makes a similar claim. Typically, Franch can put the following heading on his discussion of this subject: *Labrador, garantía de limpieza de sangre* (pp. 31ff.). All studies that I have come across concerning Spanish literature in the *Siglo de oro* insist on this distinction, Jewish workers and peasants having been extremely few.

Being or not being *cristiano viejo* counted in the community; a mere suspicion of not being "clean" could be serious; *people suspected that she was not Old Christian* (*Sospechábase en el pueblo que no era cristiana vieja*), Quevedo describing a typical situation in his *El Buscón*, p. 97. Anti-Semitism was prevalent, and Quevedo could blame Góngora for being "unclean" by referring to his big nose: *Érase un hombre a una nariz pegado* (a man attached to a nose). Jones' acute and terse comment on the general situation gives an admirably informative abstract (pp. 20f.).

Catholic writers since Teresa's time have tried to touch up the picture of her; and to "touch up" here meant to apply anti-Semitic standards. So for instance www.divvol.org/santoral/index.phps...: *La casa de los Cepeda.. en ella había limpieza de sangre, recuerdos de valor antiguo...* Such a claim about her father's house made in a modern account, insisting that she inherited "clean blood", may be in line with ecclesiastical tradition but is not in agreement with historical knowledge.

It is more disturbing when Church-sponsored *historical* accounts, in which category one should perhaps place hagiography, supported by the *nihil obstat* and *imprimatur*, appeal to God over principles *as well as* physically attestable events and occurrences. How do you explain that the Holy Spirit elected - I should say, caused to be elected, bad people as popes? Daniel-Rops, of *l'Académie française*,

quite simply takes it as a sign of the inscrutable ways of the Lord; and he adjusts the image of Teresa: she was of *sang pur, d'ancienne noblesse*.

The Council of Trent, Daniel-Rops tells us, was an *evidently providential* work, so we see, he notes, how *pour une oeuvre si évidemment providentielle, Dieu se servir de si discutables instruments que Paul III, Paul IV et Pie IV...* (Daniel-Rops, *La réforme catholique*, 42 ed., 1955, 115, 149). No mere question of belief, that is, but of *evidence*. The cited author faithfully reflects, it seems, official attitudes around 1622. No wonder Paolo Sarpi had to publish his *Istoria del Concilio Tridentino* in England (1619): the two big volumes certainly mention theological issues but wraps them up in vast discourses about local and international politics and intrigues and clashes between religious orders, states and personages such as the kings, the emperor; as usual, the French court shines in such a company. Sarpi's volumes do not heed the century-old and constantly restated doctrine concerning the general councils of the Roman Church, that they are inspired - literally - by the Holy Spirit, who was invoked for every General Council of the Church.

Whichever source we may be consulting, the Jewish communities, to return to this topic, were despised while at the same time being profitably used as indispensable factors in private and official finances (thus, for instance, passim in Alessandro Barbero's *La battaglia di Lepanto* (2010), covering some 750 pages).

1.7 Teresa and her honra

For *conversos* (or *conversas* like Teresa), it was incumbent to obtain social respect; at all times a crucial, socially lubricating factor in the Mediterranean world (where I come from, *tutti si rispettano*). Spanish tradition has two versions of what we subsume under the name *honor*: *honra* and *honor*, the latter by heritage and position, the former by personal behavior and actions as evaluated by one's community (*La honra era la consideración y la estima de que el individuo se hacía acreedor ante su colectividad. El honor pertenecía al patrimonio que uno heredaba de su familia, a través de la sangre, y que tenía su fundamento en la virtud de los antepasados, sobre todo, en la pureza que dimanaba de no haberse mezclado con judíos ni musulmanes*, Marín in Lope, *Peribáñez*, pp. 21 - 29). *Honra* can be accorded a person who is a true *cristiano viejo* and not of *converso* lineage. A case of losing one's *honra*: a priest continued to celebrate Mass while having a relation with a local woman, losing his *honra y fama*, since the affair became known in the community (p. 143). Only the nobility could claim the quality of *honor* in legal disputes.

Lope de Vega reminds his theatre audience, in his *Arte nuevo de hacer comedias* (1609), that the best topics for the theatre are those involving *honra* since they move people more than anything else (*Los casos de honra son mejores / porque mueven con fuerza a toda gente*; verses 327 - 328, cited by Marín).

Of course *honra* would be connected with other values and their contraries, such as *vanagloria*. Teresa uses them to such an extent that the social perspective of her *Vida* becomes conspicuous. Let me note some occurrences: *Honra de Dios* and - her! - *honra del mundo* (p. 125), despite all her shortcomings, the issue of her *honra* remains, considering also *la vanidad mia* and her own *muchas vanidades* (frequently repeated, along with *la vanidad del mundo*; p. 126). She puts on record her possible peccadillos from her youth at home (she was born in 1515). St. Joseph, important in her life, helped her over some shortcomings, because of which her *honra* and spiritual health might have been endangered (p. 152). Claiming his support, the risk was lessened.

1.8 *Teresa's Libro de la vida and its language - leaving us in doubt*

For the relatively few women writers in her world, language was a decisive factor. Teresa guarded herself to some degree by insisting on her being *ordered* by other religious persons (obviously male) to write her books. We might expect them to monitor the work in order not to result exposed for having supported a faulty work.

Her language, regardless of the “elevated” subject, is packed with vulgarisms and childish usages along with highly literary expressions culled from her readings (detailed discussion in Franch’s introduction to her *Las moradas*; carefully on her writing in Chicharro, 53ff.). Chicharro notes (*Vida*, p 187, note 18) her use of childish language (... *lengua infantil, muy frecuente en la santa*). Despite her too manifestly touted weaknesses, she was a manager, and we have to ask why a person with such a wide reading should make a linguistic mess of her own productions. It seems evident that she was constantly alert and conscious about her own doings and writings and that her lapses into spontaneity were calculated. Teresa may have been as spiritual as she and her followers wanted; she nevertheless is an obstinate realist, regardless of her trying to conceal this under the surface of supernatural events, spiritual talk and apologetic language. Her *Vida* must be described as an objective and realistic account in the sense that, given her convictions about the religious events as true ones, she tries to expose herself completely in a self-established context.

I haven’t seen any hint to her having been familiar with *Lazarillo de Tormes* (published in three cities in 1554: two of them in Spain: Burgos and Alcalá de Henares), but her autobiography seems to bear striking resemblance to the self-revealing method applied in the earlier fictional autobiography. If I have understood him rightly, Américo Castro hints in the same direction (Castro, p. 448). Francisco Rico, in his edition of the *Lazarillo* (pp. 28ff.; see the *Bibliography*) calls the little book *una novedad sin precedentes*, and he shows that it became enormously popular, even proverbial, once it was out. The fictional autobiography also contains a long story (pp. 46 - 71) of a *clerigo* in whose house Lazarillo stayed for a while, a

stingy but not bad character. It seems improbable that Teresa should not have known this book, which would have been before 1559, when it was listed in the new *Index*; that she does not list it along with the more innocent *libros de caballería*, is not surprising.

Let me develop suggestion that her choice of literary style and editorial technique represents an attempt to protect herself.

Teresa leaves us in doubt about how her autobiography should be understood, and its textual status is fuzzy, not only because of the inconsistent language she uses, but also because at one point she will refer to things she is going to treat later in the book, while elsewhere she claims that she does not remember what she had written on this or that earlier section in the same book. On page 294 in the cited edition of her *Vida*, she *controls her narrative, giving clear instructions for the reader concerning the setup of her book* (*gobierna su narración, informando al lector muy precisamente de las partes en que puede estructurarse su libro*; Chicharro, note 3). It is evident that she is a *planner* also in writing her *Vida*, whatever she may claim about it. Otherwise, how can she frequently refer to what she is saying *más adelante*, further on in the book (e. g., *Vida*, pp. 202f.)?

When she with equal frequency claims she has forgotten what she wrote earlier on, it is obvious that she is playing up to the Inquisition. This strange editorial technique bolsters one's impression that she tries, with something the Italians call a *depistaggio*, to lead her readers astray, thus to prepare herself for a possible and much-feared hearing at the Inquisition. It is remarkable that the friars who allegedly "ordered" her to write her books, should not have interfered to correct these and other blatant errors in her writings. Perhaps they too wanted to protect her.

She may have tried to affect a populist idiom since normally the lower classes were not Jewish. But she did *not consistently* write in the manner expected from someone with a low level of education. Furthermore, would she really have renounced on having a certain social standing? She was hardly a great stylist; a famous poem attributed to her by all the anthologies - *Véante mis ojos*, according to Jones (who rejects the attribution, p. 137), in quality is far above her generally rather flat, *mediocre* poetical production. Her proper idiom was *prose*.

Being a little childish and linguistically incompetent and not always consistent, could prove to be an effective defence, should the Inquisition start making noise (*oh! I am not sure I meant that!*). Being vague, you can make yourself slippery like an eel. And the Inquisition, mostly Dominicans and pupils of Thomas of Aquino, had to play the game accordingly and not make a mess of the semantics. The inquisitors were surrounded by their brethren (illustrated in a painting by Francisco Goya in the *Academia de san Fernando* in Madrid), and they would have been involved in fierce competition all around.

There is another possible factor to consider. Groups of people, especially the *popolo minuto*, who have been used to being cheated by despotic, corrupt and un-

just authorities for decades, even centuries, tend to develop a culture for evading clear verbal statements and reports, opting instead for equivocal, often truly obscure, answers even to precise questions.

Teresa's written language, now learned now infantile, can leave us with perplexity. Shaky writing has a history. We have learnt that the Roman emperors from Charlemagne to the Ottos never mastered writing and reading, leaving this to clerks and other servants (and of course the Church). More recently, some people have used the idea for social climbing. In the *Deffence et illustration de la langue françoise*, 1549, and follow-ups on it, French culture saw an "explosion" (Spaziani, pp. xf.) regarding linguistic usages; writers now asking, by what criteria and to what extent one might draw from popular language, from dialects, from craftsmen's terms? (*Con quali criteri e in che misaura si poteva attingere alla lingua popolare, ai dialetti, ai gerghi dei mestieri?*). In Quevedo's Spain, we hear *il Buscón*, a prefiguration of Thomas Mann's *Hochstapler Felix Krull* (Quevedo, *Buscón*, p. 113), tell us that he didn't need to be able to write, since writing badly, if at all, was a characteristic of the class of *caballeros* (*non sabía bien escrivir, para mi intento de ser caballero lo que requería era escrivir mal*). In Teresa's case, this *get-it-both-ways* semi-illiteracy could prove useful, to lift up her social image a bit when facing the world at large, to use in defence if the Inquisition should become interested.

For her numerous expressions *in volgare* she had plenty of models. The available reports on Teresa's *readings* are not very reliable, but she must have been well up in Spanish literature, such as the arch-realist *Lazarillo de Tormes*, published in three cities in 1554. Her father, she says (*Vida*, p. 119) was *aficionado a leer buenos libros*. Reputedly, in her youth she spent much time on *Libros de caballerías*; a despised category of literature now radically re-evaluated and credited by Jones, pp. 87ff. Here, the stories were fairytales, but the details and the linguistic expressions and the talk among people often manifestly realist, - as in *Don Quijote* (or in later theatre for that matter: Lope de Vega and others). Even this category of literature was suspect, however, and in 1555 the *Cortes* of Valladolid asked the king to prohibit them (Castro, p. 618).

1.9 *Fearing the frailes*

Teresa's position, we have noted, was not one to be taken for granted, seeing that she was known or suspected for descending from converted Jews. Her writings reflect this problem, especially so her autobiography, *Libro de la vida*, a book that will have to be regarded as having her social position as one of its major themes (Chicharro, in his *Introduction to La vida*, pp. 19 - 92).

Several modern authors claim that Teresa's *Vida* was influenced by her fear of being summoned as a defendant by the Inquisition, especially because of her *origen judio-converso*. Teresa, *in all her life, kept a suspect silence concerning*

her lineage. The falsification of her genealogy and the many lies by the witnesses in her <canonization> processes show how important the issue was considered (Chicharro, in *La vida*, p. 26, who gives a list of these witnesses and their testimonies; p. 22). The "canonical" literature is silent about such an information, also that her grandfather, Juan Sánchez de Toledo, in 1485, was condemned by the Inquisition to appear in the churches of the city on seven Fridays in a *sambenito* (a kind of clown's cloak) covered with crosses.

The Spanish Inquisition, with its Dominican *frailes* and its *familia* (collaborators, hangers-on and paid spies and reporters, often among a victim's neighbors) kept its potential "clients" constantly scared and uncertain, since their *accusations were kept secret* (Quevedo, *Los sueños*, p. 87); and fundamentally different from the practice of the civic courts, in which the charge was made known to the accused. The Dominicans at Toledo had a good theological and "pastoral" backing for their watchfulness, for example in the *Specchio di croce* by the Dominican Domenico Cavalca (esp. chapter XIV, *Della sesta beatitudine, cioè della mondzia del cuore*).

Not even bishops or monks could feel safe. An archbishop of Toledo, the Dominican Bartolomeo Carranza, was arrested on suspicion of heresy; he was put in jail in Valladolid, later to be transferred to Rome, where he stayed in prison till his death in 1576 (Teresa, *Fondazioni*, p. 1176, limits herself to citing the vacancy). Fray Luís de León spent five years in prison for having translated Solomon's *Canticle* into Castilian, contravening against the Tridentine decree forbidding "private" interpretations and translations of Biblical texts (today available in the catalog, No. 540, in the *Ediciones Cátedra* of Madrid).

Since the Church reserved for herself the right to interpret the Biblical books, the Council of Trent declared that no one must treat the *sacram Scripturam ad suos sensus contorquens, contra eum sensum, quem tenuit et tenet sancta mater Ecclesia, cuius est iudicare de vero sensu et interpretatione Scripturarum sacram*,... (Gisolfi and SL, *The rule*, p. 81, note 71; Denzinger-Schönmetzer, *Enchiridion*, documents ref.number: 7bd).

The class of merchants and financial operators, rarely belonging to the category of Old Christians, would be constantly under observation by the Inquisition, the Spanish version of which was mainly concerned with the *converso* issue, formally promoted heresies not being a great problem in this country. To be suspected of Jewish origin, even after five generations of being practising Christians, *era la mayor infamia* (Chicharro).

Things could be arranged (as always, one would say), if you had money and/or influence. One of the most aggressive leaders of the Spanish Inquisition, Cardinal Torquemada, was himself of *converso* origin.

The *Spanish Inquisition* focused on far more subtle tendencies that might expose their victims more definitely.

My impression is that theological considerations dominated the critical distinction: *thinking in Jewish or in Christian terms*. The principal - and *canonical* - theme here was, for the Christians, a permanently reiterated theme, how the Old Law (Old testament) gained justification and significance through the New Law (Christianity); succinctly expressed by Tirso de Molina in his *Don Gil de las calzas verdes* (*Acto segundo*, verses 1260f.) ... *como la ley vieja, / que tendré gracia en virtud / de la nueva* (since the Old Law, which gains grace by virtue of the New <Law>...).

This typological principle is deeply rooted in the *Tradition* (the one with capital *t*) of the Roman Church. The Tradition is full of references to the *Church of the Old Testament* (*ecclesia veteris testamenti*).

At the time of the decoration campaigns in the *Sistine Chapel* (1471 - . 84 and 1508 - 12) in the Vatican, where the concluding vault program, by Michelangelo, is not understandable unless one takes the typological doctrine in consideration, the dogmatic notion was conspicuously at public display in the city of Rome. The big inscription at the base of the apse mosaic (1116) of San Clemente announces that the *Cross makes the Church flourish, which had "withered" under the Law, like the vine*, which covers the entire mosaic: ECCLESIAM CHRISTI VITI SIMILABIMVS ISTI~ + [inscription concerning the cross relic] + QVAM LEX ARENTEM SET [*sed*] CRVS [*crux*] FACIT ESSE VIRENTEM; there was a cross relic in the apse wall (SL, *Working*, 2.2).

The typological correlation between on one hand the Old Testament, the greater part of which made up the Jewish *Thorah*, and, on the other, the New Testament, was a particularly sensitive subject; and a very likely subject for a trial by the Inquisition. The fundamental principle in *Catholic Christendom* being that the New is not only a confirmation of the Old one but also imposes a mandatory principle for how to interpret it. It does not take much to talk about these scriptures, even indirectly, and accidentally expose oneself to suspicion of cryptic Judaism. The Inquisition, which kept you under constant observation, however distantly, using also your confessor and your neighbors, would be especially vigilant over this subject since this was the exact spot where the difference between being a convinced Christian and a cryptic Jewish believer might be concealed.

The process against the victims of suspicion or concealed information, was not an open one, rather a sort of semantic torture. The historian and member of the *Real Academia Española*, Arturo Pérez-Reverte, offers a description of a typical hearing (*Limpieza de sangre*, Madrid 1997; one of a series of historical stories, rather pedestrian, to tell the truth, from the early seventeenth century). In Reverte's reconstruction of a hearing, the youth being called before members of the Inquisition, as was the norm, is kept without informations about the imputation,

also regarding witnesses and informers, the *frailes* limiting themselves to ask question after question.

People would be fearing they were being silently examined, without any possibility of being told, until the day they were summoned - still not knowing why. Generally, the inquisitors, for each question (*pregunta*), would know the answer, adopting the old usage in the Church of making the opponent expose himself/herself. The questions were precise and to the point, and regarded what we may consider *component matters within the main concern, which was left concealed*. A well-defined question could be pertinent or plainly misleading, throwing the accused off his guard and into confusion. This technique made it easy for the highly trained Dominicans to lead the accused into a trap. You were not told what they might condemn you for, they took all the time they wanted, noting carefully down all your answers and *how* you answered, forcing the questions on you until you were exhausted, they paid your neighbors and people in your entourage for information about you, without telling you anything about it. And they accepted and sifted information from people who knew you, remaining anonymous. Many informers were *judío-conversos* themselves who wanted favour with the Inquisition.

Such a trial, Guantánamo style, often including various degrees of torture, could go on for weeks, months or even years; and might end up with an *autodafé*, a public burning. As in Rome, the killing was left to the civil authorities, since the Church could not interfere with God's dispositions by taking human life; bloodshed was not acceptable anyway, by burning the victims one avoided that. The Spanish Inquisition at least took the care of hanging the victims before burning them, while in Rome the procedure was direct and brutal.

The badly reputed Inquisition, however, stuck to established principles in dealing with suspected Jewish practices; judged by their stated rules and principles, they behaved usually correctly. This cannot be claimed for the Church authorities in general, for instance in Würzburg around 1350, when the bishop, after having borrowed great amounts of money from the local Jews, had them all murdered (except those who burnt themselves in their houses) on concocted accusations (having poisoned the wells, causing the plague to break out) (Adamson, *Introduction*). And yet, the money-lending *prestamistas judíos* were useful, even necessary in a budding money economy

1.10 *Teresa manager*

Teresa presents herself to the world as extremely active in religious work, she founded or participated in founding an impressive number of convents; as she describes in her *Las fundaciones*, 1576 (which I have not seen in the Spanish original; Italian version in the *Bibliography: Teresa, Opere*). For a woman to administer, in Spain in the sixteenth century, the planning and implementation of

organizations involving women of high social standing ("lower-class" women were not accepted), and very conscious about it, she must have been endowed with special skills, also diplomatic ones, and a strong will and stamina to face institutional, external-relational and personality obstacles and overcoming them; and we know from her writings that she was highly intelligent. Reading her *Fondazioni* as well as her *Las moradas*, I obtain a picture of her as someone enabled to handle such challenges; a cool strategist, whose leadership is masked in apologetic prose.

Hardship on travels (cold evening, no blankets, etc.) and occasional quarrels with local ecclesiastical authorities, are recounted alongside with all the lofty experiences. She also had problems with some of her confessors whose upsetting job it was to guide such a strong-willed female as Teresa (notes on her problems with the confessors in Castro, pp. 575f.).

She claims to have a faulty memory and will have to give an incomplete account, thus guarding herself over omissions, and against censorship by the Inquisition. She does remember some *minutiae*, which would not provoke the Dominicans, such as that she fixed a water well against the advice of the plumber (*Moradas*, p. 177).

Teresa of course had to attribute the founding of new institutions to divine intervention. It was God who, when the night was cold, "found" the residing majordomo - who *did* have coverings for the night (*Fondazioni*, p. 1092). God helped them in the conflict with the local Austin friars, who did not want the *descalzas* in their neighborhood; referring to a rule against religious institutions being placed too closely to each other (pp. 1089f.). God protected them against the *toros* running wildly in the streets of Medina del Campo (p. 1091). It was Christ himself who advised them about the important subdivision of the order into *descalzas* and *calzas* (p. 1336).

In Teresa's accounts of the specific works, when all went well, God had provided for them; when not, God had intended it for their best, he knowing better. By using this technique - she was certainly not the first, she achieves two things. One, her own primary importance will be assumed as central - an affair between God and she herself - while concealed under her modesty. Two, she leaves no options for the Inquisition: they could hardly protest that the foundations were *not* decreed by God; so that the mechanism to some extent protected her against the Dominicans at Toledo.

Was she then not endowed with a free will of her own? Catholic teaching, especially after Calvin and his *predestination* dogma, placed great emphasis on the determinant character of human *free will*, starting, of course, with Adam. If you do not have your will, how can you be blamed, and even more importantly: there would be no *felix culpa* for the Church to have as her *raison d'être* as the administrator of salvation. The principle belonged to Tradition (with capital T) (Denzinger-Schönmetzer, *Enchiridion*, Nos. 227 (an. 418), 245 (prob. an. 431)

621 (an. 853: *Homo libero arbitrio male utens peccavit et cecidit et factus est 'massa perditionis'* [Augustine] *totius humani generis* (reused at the Council of Trent, see Denzinger-Schönmetzer, Nos. 1521 - 1555). This tricky and serious quandary had always been the subject of ultra-refined theological explanations.

Facing complex *management*, one would be involved in a related problem, for which no articulate theory was available, excepting, of course the Pope's *potestas administrativa* (series of council statements from mid-fourteenth century and on). What might be the role and competence of *human planner*, when everything was left to God? The Inquisition could hardly let go of the divine management (except in cases of flagrant mismanagement, against which her entourage guarded her), but then one had to go slowly on the issue of *liberum arbitrium*, never mind Adam. Teresa was a cool customer, meandering her way around the obstacles, expressing herself vaguely whenever this was preferable.

1.11 *Snobs in seclusion*

After having praised selected individuals among her *monja* sisters and her confessors, she attacks the snobs in the convents. It stands to reason that her dubious heritage and failing *limpieza de sangre* was commonly known. The convents were customarily (later, by law) closed to people of less than high social standing (or those who might be able to pay secretly). It is not surprising if the inmates looked upon her with misgivings; it is really remarkable that she was at all admitted. If her father paid for her being accepted, we would not have been told. Anyway, sending your daughter to a convent might save you a great amount in dowry, more than you would be expected to invest in a convent. In addition - and this counted in those days - you invested something in the future of your soul.

On the social issue concerning the convents, she refers to the haughty ladies in some of them (*Vida*, pp. 159f.). Of course she knows better than attacking directly their snobbery and possible misuse of their social standing. She denounces their *worldliness* and their attachment to *las honras y recreaciones del mundo*; for once, God remains in the background. If their fathers would take my advice, she writes, they should look ahead and not place their daughters in *suchlike convents*. The concluding blow against these ladies: they do not seem to understand what they are doing (indirectly quoting Christ) and, above all, what they are missing; so she plays generosity against them. This goes on for a couple of pages in *Chapter VII* of the *Libro de la vida*.

1.12 *Using relevant sources*

There is a general agreement among literary historians, as noted already, that the *theatre* in the Spanish *Siglo de Oro* reflected, confirmed and reinforced among people in general, the most important political and social doctrines, practices and positions in Spanish society of the sixteenth and seventeenth centuries, including

the *converso* issue concerning converted Jews. Which does not mean that the ideas originated in the dramatic arts.

Nevertheless, highly professional and masterful chronicles like Edwards and Lynch, *Spanish History* (Spanish version in the *Bibliography*; the original British version not available), omit the subject of the theatre altogether. The chief creators of the theatre, Lope de Vega, Tirso de Molina, Luís de Góngora, Francisco de Quevedo, are left out, while Fernando de Rojas' *Celestina* curiously enough is honored with a paragraph. Speaking of prose literature, the arch-realist and socio-politically crucial *Lazarillo de Tormes* (1454), is passed over in silence; a book that was duly prosecuted by the Inquisition on account of its realism, and which consequently was republished in bowdlerized versions. Many performances here were forbidden in 1559 by the Inquisition at Toledo.

The theatre was evaluated as something more than pure literature, reflecting, as it usually did, dominating social ideas, or ideals, by developing in Spanish literature one of its most frequently evoked and fertile themes: *honor and vengeance* (Wilson and Moir, p. 46; see also their comments on the social role of the theatre, p. 52), a role which is indicated also by the usual name for theatre buildings and locales as *corrales*, stables for cattle and horses (e.g. pp. 93, 132). The theatre in Spain seems to have played a social and political role even stronger than in Tchekhov's Russia.

Let us look at the subject in the perspective of History.

1.13 *History*

It is well known that nothing is more relative than the History of the notion of historical reality... (Como bien se sabe, nada es más relativo que la historia o el concepto de realidad histórica...); thus the Italian professor of Spanish studies at the University of Turin, Aldo Ruffinatto (in his edition of *Lazarillo de Tormes*; see the *Bibliography*). It is possible that "everyone" is aware of this, but the question is whether this awareness has proved productive.

We do need chronicles, from Titus Livius to Runciman. But we also can profit from non-academic stories like Balzac's *Illusions perdues*, to cite just one example of socially and economically informed literature. And, for the Spanish scenario, we can learn from the theatre of the *Siglo de oro*. We also need historical studies that are *not* bounded by periodization, but focus on problems and systems, using models evaluated for their analytic usefulness, applying *open-source* approaches, rather than their chronological anchorage.

One is left with the impression that in some academic circles, the discipline of History should be limited to areas for which there aren't other academic denominations, however vaguely structured, such as Art History, Literature, Music. The outcome is omission of important documentation concerning the manifestation and confirmation of social and political mentalities and attitudes.

Part II TERESA IN THE VATICAN 1622

2.1 *The Canonization of 1622*

On 22 May 1622 were canonized no less than four individuals: Filippo Neri, Francisco Javier, Ignacio de Loyola and Teresa de Cepeda y Ahumada. Studying this selection with the purpose of illuminating Teresa's standing would be highly complex (and one cannot make statistics with four cases), not the least because she is the only woman among the new saints.

A noteworthy aspect of this quadruple canonization is that three of the elected ones had founded ecclesiastical organizations in Europe (Filippo Neri, Ignacio, Teresa), while the fourth, Francisco Javier (*nobilibus parentibus natus*), whose *praepositus* had been Ignacio himself, had founded Christian communities in Eastern countries.

Behind such a consistent choice of four institutional founders in a period when the position of the Roman Church had been challenged by external forces, there is a *plan*. The choice for the 1622 canonization was a political one; establishing the traditional Church in the organizational standards of the day.

The Vatican (earlier, the Lateran), had always been a political organization, and had developed early into a real-estate and, since the fifteenth century, a banking concern. Not all transactions were equally clean. Paolo V's (Borghese, 1605 - 21) nephew, Cardinal Scipione Borghese, sent a gang to Perugia at night to steal Raphael's *Deposition* in San Francesco, which ended up in the Galleria Borghese, Rome. When the Peruginese implored the Pope to hand it back to them, he answered that the painting should be considered a donation from Perugia to the Pope. Monetary preferences tended to dominate, as in the ugly affair concerning Beatrice Cenci under Clemens VIII.

For most Nordic people like myself, the institution of the Vatican will not be familiar, since it is mainly known from formidable display in the exedra of St. Peter's. A comparison with a more familiar model may be useful. The earlier *Soviet Union* provides a strikingly adequate paragon. A select group of people focusing on a sort of faith - marxism-leninism (I recall our belief in the former of this couple when we were young), shutting out everyone who might dissent, even in other countries, displaying spectacular ceremonies in support of the ideology (*fisikulturnuy parad v' Moskvé*, for example), while practising a dictatorial policy internally and playing the usual financial games inside and outside. A self-reproducing factor of super-consistent selection among the candidates for office, dominated the history of the Soviet State. In the Vatican, this is effected through the election of consenting cardinals and by a corresponding choice of beatified or canonized individuals (not a "Baroque" phenomenon, seeing that Pope Giovanni Paolo II. Wojtyla between 1978 and 2004 proclaimed 482 saints and 1338 *beati*: Galeazzi and Pinotti). The Protestant reaction against the sale of Indulgences is well known.

It is always risky to try to compare modern experiences with situations of earlier times, but without the news media we have today, behavior inside the Vatican was less transparent, and it may be feared that the top echelons did not behave much better, fighting between themselves. Another, probably more pertinent consideration in the context of today, and which implies a warning against simplification in historical reconstructions, is to *distinguish between the Roman Catholic Church and the Vatican*, as has been emphasized recently by several people, among them the eminent historian Corrado Augias.

The Church and the orders and fraternities at the social and medical levels certainly did and do a great work of charity; right back to Gregory the Great (died 604), when the diaconate churches provided the Roman people with bread; founding and administering hospitals; not to be specific about the crucial attendance to people's spiritual needs. Of course it should not be forgotten that the Vatican also was and still is a place for religious activities, as is clearly displayed by a vast array of rites and ceremonies. It may be suggested, finally, that the Vatican to some extent was a pioneer in European long-term political and financial planning.

Before reading the Breviary concerning Teresa, we should note that the canonization of a candidate for sainthood provides the focus for those texts. Since here we are after the conditions and perspectives addressing the public, especially the congregations, we shall pass over the hugely complex documentary work preceding the canonization, just noting that, in the Roman Church, after a few fundamental notions had been established, the further dogmatic and doctrinal determination followed with a systems logic (this, at least, is the ideal).

The canonization documents are enormous, but the end product and the one facing the congregations, is the Breviary text, the liturgical readings and recitations on the saint's day; this end product being the public showcase for the saint in question (some details in SL, *Some observations*).

The canonization process was never a simple affair, furthermore, it underwent changes through the centuries. Let us ask Michael Goodich to summarize some essential points (Goodich, p. 177): *By the twelfth century many hagiographical sources were often based on eyewitness testimony to the saint's life and miracles reported in the course of a papal canonization process, a hearing conducted by the local bishop or statements recorded before a notary. Even prior to the formal adoption of the canon law for the deposition of testimony and the conduct of an inquisition or inquiry, enshrined in the 1234 Decretals of Pope Gregory IX, many miracle collections in particular betray signs of some kind of official inquiry guided by the rules of evidence. The adoption of Alexander III's 1161 demand that all cults and relics require papal approval merely hastened the growing reliance on legitimate evidence of a virtuous life and provable miracles as the foundation of sainthood, perhaps encouraged by the wearisome rise of heresy* (I do not have sufficient space for doing justice to this important contribution).

Rules and norms had changed over time, also regarding ecclesiastical approbation and condemnation. By 1622 we are no longer in the thirteenth century, when the popes excommunicated declared political foes and even promoted "crusades" against them (the Hohenstaufen, for example), without, it seems, canonical endorsement (Runciman, *The Sicilian Vespers*). Political theory and economic development made that no longer practicable, however "infallible" a pope might be.

The pontiffs of the late sixteenth and the seventeenth centuries had to rely on much more subtle motivations and at the same time refresh their historical documentation. The colossal work of Bellarmino, while mainly aimed at the Protestants, is at the same time a restatement of the Catholic Tradition (definition in SL, *Iconography and ritual*). Being a pre-nineteenth-century source, Bellarmino's work is especially useful for earlier periods, before the Old Testament aspect of the Church, while still being there, was somewhat toned down in the later synod statements.

By 1622, canonization practices reflected actual Vatican policies and politics. While earlier documents on the canonization process and its epistemological foundations are scarce (Denzinger-Schönmetzer, *Enchiridion*, 675, quotes one early statement, which is dated 993), the question of canonization is discussed at length in Bellarmino's *De controversiis* (Vol. II, 1580s, columns 636 - 639; the total discourse on canonization, sainthood, veneration of saints and their relics and images of them runs from column 613 to 828; details in SL; *Patterns*, 2.2.12). Indicating size is not irrelevant here, for this may give an impression of the immensity of the work, reflecting the range and complexity of the subjects.

My copy of the *De Controversiis*, in the Milan 1721 edition (which is complete and includes some other minor writings by Bellarmino), consists of four volumes (each a *tomus*) with 39 x 24 cm printed pages. Each page has two columns paginated by column numbers (each page thus having two numbers). Each column has on average 72 lines with approximately 50 points each. Vol. I has 1044 columns text and 48 pages index, while volume III has 1427 pages text and 84 pages index; volume IV is about as large as vol. I, while vol. II is a bit skinnier.

The enormity of the work must be understood on the background of dogmatic "proofs" and "evidence" in the Roman Church that had to be re-confirmed in the face of Protestant challenges: *the establishment of a Tradition in writings and practice from early Christendom up through the centuries, with the proviso that this Tradition had been founded and supported by God*. So that the Church claimed to prove its prerogatives by self-reference. With this highly systemic foundation, it is understandable if the popes and their entourage have rejected any innovation that might threaten the system. One could apply Paul Feyerabend's comment concerning Bellarmino's rejection of Galilei's discoveries: *he had no choice*.

After the Reformation, the subjects of *sainthood* and *canonization* had become urgent. The subject of the existence of saints, the veneration of them and prayer to them, as well as the formalized liturgical focus on them, including their images, all these themes became especially critical after the attacks by the Northern Reformers. Bellarmino "proves" a large number of arguments designed to refute the Protestants on these points. The entire argumentation is based on earlier statements in the Church (details in SL, *Patterns*, 2.2.12). Bellarmino treats the matter under four headings: can (prospective) saints be canonized? In which case, who holds the authority to do so? Thirdly: is there infallible judgement behind the canonization? Finally, Bellarmino's evaluates the cult of those who are canonized. The third question is handled in *Caput IX, Credendum esse, Pontificem non errare in Sanctorum canonizatione* (the Pope cannot err in this assignment; his infallibility being established).

On col.s 636f., Bellarmino offers the following brief definition of the meaning of a canonization: *Igitur canonizatio nihil est aliud, quám publicum Ecclesiae testimonium de vera Sanctitate. & gloria alicuius hominis defuncti; & simul est iudicium ac sententia, qua decernuntur ei honores illi, qui debentur ijs, qui cum Deo feliciter regnant: qui quidem honores..- septé esse solent* (and he goes on to list the seven conditions and actions).

Traditional authors (Sts. Ambrose, Augustine and others) are cited in support of the infallibility, which has been reaffirmed in modern times (summary in Ott, p. 361). The truth-value here is based on the notion of a consensus in the Tradition of the Roman Church. By 1622, then, the Church had ensured the necessary but somewhat circular support for the quadruple canonization by the criteria established by the same Tradition.

Of course we are told that the specifically saintly status of some historical person is authenticated by her or his *miracles*. Miracles come mainly in two versions, the chain-supported and the statistical. In the first case, oral and written tradition takes us back more or less to the person's own time and place, when for instance someone is reported as having seen St. Johann Nepomuk walk in the air, unhampered by gravitation. This model bears some similarity to the Islamic *isnad* or chain of witnesses. Or a statistical miracle arises. Five persons, say, have survived a certain fatal illness the last thirty years (some would say, by a freak of nature, a system disturbance), one of them having prayed to Saint Acarius of Noyon (patron of difficult characters). Then we have a miracle of St. A.

By 1622, the crucial statements on the nature and veneration of saints had since long been formulated by the Council of Trent: *Decretum de Invocatione, veneratione et reliquis Sanctorum, et sacris Imaginibus*, on 3. December 1563 (Denzinger- Schönmetzer, 1822 - 1825). Reporting on this, Paolo Sarpi for once remains neutral (*Istoria del concilio tridentino, Capitolo ottavo* of the *Libro ottavo*, pp.991ff. in the modern edition cited here), whereas the entire setting and de-

velopment of the Council according to him was subjected to political intrigues - the French again! - on many levels and correspondingly influenced; despite the established conciliar doctrine, that the general councils were directly guided by the Holy Spirit. Sarpi was forced to publish in England (London 1619).

The creation of a saint, besides the ownership of an important relic, was an important source of income for towns, nations and churches, laying the foundations for a pilgrim site. People would assemble there on all sorts of occasions; markets would be established there, a constant stream of money would flow in and business would flourish (we see the grotesque results of this in Assisi, the home of two saints, Clare and Francis, turned into a huge curiosity shop).

Too much has been written on the economic side of the pilgrim cities for me to try to recapitulate it here. Generally, we understand that in any town or region there will always have been strong economic incentives for trusting, at least accepting, records that might support a local candidate for sainthood. The Breviary not only backed up the belief but gave bowdlerized details concerning the achievements of the actual saint. Thus also regarding Teresa.

2.2 *Teresa on October 15*

The Breviary has more to tell the congregations and us. Scanning the readings for 15 October, St. Teresa's day, we encounter yet another Teresa. Understanding adequately the complete texts in the Breviary entries is not a simple assignment. The Latin may be plain enough, but the text body for one saint has to be compared with that of others. For instance, how is the social status of one compared to that of another recited or defined? In a historical perspective, one has to take into account the context at every moment, liturgical, political and so on, including the role, aspirations and manipulations of the relevant popes and their entourage; and, regarding Teresa and sisters, the evaluations at any time of females in a generally male world. Wanting to canonize, say, a Dominican man or woman, how did this Order stand at the actual moment? The candidate for sainthood, to which nation or state did she or he belong? Did international politics play a role in the decision process? Furthermore, we have to face editorial issues. Breviary texts (hymns, readings etc.) are written in concentrated recitable form, making a correct translation difficult at points. We need studies of these texts as a scholarly subject in its own right.

How much of the individual candidate's personality survives the canonical treatment? Not much, to tell the truth - a case that seems replicated today, in the beatification process regarding Pope Giovanni Paolo II (Galeazzi and Pinotti, *see the Bibliography*).

For one who is no believer, to see an individual being completely dehumanized in the process of being beatified or canonized, raises the question of what kind of God is being brought into focus. Typical for the Breviary accounts of the

saints, Teresa included, is that they depersonalize their subjects into "perfect" but totally impossible and, I should believe, unapproachable creations, pale creatures most appropriately illustrated on the little printed folders we find in the churches, seeming to have acted on Gabriel García Márquez' recommendation: *dejar en cualquier parte ese inútil adjetivo de su personalidad*. It is interesting, for some even depressing, to note that the late Pope Giovanni Paolo II recently has been subjected to the same drastically simplifying, bleaching and un-historically idealizing treatment in the beatification process, omitting all features that might be embarrassing, such as his bypassing less conservative clergy, making corresponding choices in Latin America, supporting strange financial operations, and generally rejecting all debates concerning fundamentals.

2.3 *Returning to the Breviary*

The Breviary, of course, was the model needed for the liturgy on Teresa's day, 15 October, repeated annually after 1622, when she was canonized by Gregory XV. It is this set of prayers, hymns and readings (from now subsumed under the not entirely precise word *readings*) which constituted the most direct "biography" of Teresa in ordinary congregation life in Rome and elsewhere in the Catholic world. These readings also provide the direct sources for most pictorial representations; people followed the recitations and saw them visually confirmed by the images. The Breviary readings (SL, *Iconography and ritual*, pp. 20, 26, 82f.) provide the most important documentation for any imagery involving Divinity and saints in and outside of the altar setting, in which latter case the Mass celebration of course is the determinant factor.

Some paintings by Caravaggio, for instance, are not understandable without taking into account the related Breviary readings (SL, *Working with pictures*). The Breviary readings will have been formulated and authorized in connection with the canonization of a saint, and it will have been known to all who were concerned with commissioning, executing, approving and liturgically using the picture representing whatever scenario involving her or him. Having no statistics at hand, one can still assume that the artists were obliged to follow the readings, at least not violate their messages; especially so in the wake of the Council of Trent (concluded in 1563).

The Breviary makes Teresa the archetype of a person earmarked for saintliness; so were many males and females, usually in more or less the same wording. In the midst of all the repetitions, there are hints that may turn out useful, not so much as a testimony directly concerning the actual saint, but about the imposed reception of the general hagiographical notion and the related veneration among the believers, in the normative prevision on the part of the Church. The text supplants the biography, turning the data into formulas adapted to canonization, the

authorities not forgetful of the fact that *canon - kanon*; meant a measuring line or rod, hence a rule, canon, model (Lewis and Short, *Latin Dict.*).

My intention is to identify the points at which the readings correspond to or deviates from Teresa's actions as discussed in the preceding chapters in *Part I*, making up a framework (or frameworks) for our understanding how the authorities and the planning outfit might decide on or come to terms with *Bernini's project*. This is the minimum we can do in order to discuss his work, which was, after all, conceived, planned and financed for public use.

Now let us read about Teresa in the Breviary (verse numbering in the complete Breviary text for October 15, *see the Supplement*).

Hymnus:

On October 15. As messenger for the celestial king, you left your home for the lands of the barbarians to give yourself and 5. your blood to Christ.

For death is milder to you, penance sweeter; fainting being stabbed and wounded by the javelin (spear, lance, arrow) of divine love.

10. O victim of <divine> charity! You set our hearts on fire

People believe you are free of the fire of Hell.

Oratio:

... Hear us, God... so that we may enjoy the feast for your blessed virgin Teresa.

20. so that we may be nourished on the "ambrosia" of her heavenly wisdom.

Hymnus:

This is the day in which Teresa like a white dove is 25. transferred to the sacred temples in Heaven...

Lectio IV:

35. The virgin Teresa was born in Ávila in Spain, of parents who were excellent both socially and in religion [here, the Vatican was careful, not claiming she was, like Javier, of noble origin].

She learned from them to fear God, already in young age showing signs of her future sainthood

36. Reading assiduously the lives of the holy Martyrs, the Holy Spirit kindled her in her meditation, so that she left her home to go to Africa to offer her life for the glory of Christ and the salvation of souls.

38. - 42. Called back by her father, but burning in the desire for martyrdom, she indulges in pious works and, despite grave illness for many years, she resisted all temptations and worked, with the blessing of Pope Pius IV, for the establishment of convents under the Carmelitan rule, suffering for the heretics and dissenters.

43. Her heart burned in the fire of divine love so that she was rewarded by an angel who pierced her body with a flaming javelin/dart/arrow, and she heard Christ calling her his bride.

44. She wrote many books inspired by heavenly wisdom, and through them led the minds of the Christians [*fideles*] to desiring the heavenly home.

45. - 47. Her illnesses and suffering and self-inflicted pain; and her death in Ávila comforted by the Sacrament.

48. - 50. At her death Christ appeared with a host of angels and a dry tree began to flourish. Her body remains incorrupted till this day, surrounded by perfumes inciting veneration. Performing miracles both while alive and afterwards, her sainthood was declared by Pope Gregory XV.

A predominant and recurrent event in her life, as in the lives of other candidates for sainthood, came in the form of *visions*; and, like most of them, also a highly developed faculty of seeing things with the notional spiritual eye; Lodovico Barbo is perhaps the most typical representative with his book published in 1443.

Part III VIEWS AND VISIONES

With my initial focus on Bernini's chapel, I have tried to articulate an account of critically relevant concerns in Teresa's life and writings, some features of her biography being highlighted in the Breviary. Visions play a great role in her *Vida*, and denote a subject of wider range than the narrowly personal, and to this we now turn. The Breviary does not explicitly refer to her visions, except in connection with the arrow event, and the event of Christ walking beside her: 43: *et audierit Christum data dextera dicentem sibi*; limiting the scope to her temptations generically speaking (39: *variis tentationibus vexata*) and to her delightful suffering at the end of her life (47 *Intolerabili igitur divini amoris incendio potius, quam vi morbi, Albæ cum decumberet, prænuntiatio suæ mortis*).

3.1 *In the shadow of the sobrenatural*

Chapter XIV in Teresa's *Vida*, pp. 217 - 223 is dedicated to *cosa(s) sobrenatural(e)s* and has been much in the centre of Teresian studies. I shall let that go, my purpose (indeed my competence) not being to come up with yet another record of late sixteenth-century more or less mystical approaches, but merely to try to evaluate some formulations that seem crucial regarding, not the umbrella concept itself, but her description of specific mechanisms in her recorded experiences.

She seems to imagine herself living in the close and protecting shadow of divinity, an idea we also find in Giordano Bruno's recall of *The Song of Solomon*: SVB VMBRA ILLIUS QVEM DESIDERAVERAM SEDI, *seated under the shadow of whom I desire* (SL *Patterns*, 1.3).

Teresa stays within the Tradition, without being explicit about it, in her descriptions of her arrows (*Vida*, pp. 353; and above, chapter 1.2) in terms comparable to those used by Barbo. The *dardo* seemed to hit her heart several times, and, as quoted above, the pain was sweet, we read, and it was not a bodily pain but a spiritual pain, even though it did hit the body too, and hard enough. It was such a graceful link between God and the soul.

Spanish religious people are often classified as mystics. I have no quarrel with that, but would like to debunk some applications (such as using "The Baroque" in an attempt at identifying causation) and put on record that a) participation in the Mass has always been defined as a mystic experience, sharing in the *mysterium tremendum*; and b) that much earlier, non-Spanish people impart and teach equally mystic approaches, without being thus classified.

Historical studies tend to stay within given "periods", so that specific terminology and concepts are developed for each of them, in disregard of the contingency or even fact that the crucial phenomena generally remain the same across such boundaries - and especially so in the Tradition-driven Roman Church.

My impression is that the terms *mysticism* and *mystic*, as the corresponding concept is being used in recent historical literature, could do with a cleanup. In his

admirable little history of Spanish literature, González (p. 63) speaks most appropriately of the development of a literary tendency: *una corriente literaria: el Misticismo*. Part II in SL, *Patterns*, is built on the idea that the *edad conflictiva*, as Américo Castro (in a book I have not seen) calls the culture of conflicts and instability in the seventeenth century, was a concern of specific people and groups and became a prominent literary subject. Indeed, and Penco's *Spiritualità monastica* offers vast evidence to the effect that such realities were not novel as literary themes. But the ideas became more commonly circulated now, since there had been a steady increase in book-printing and publishing facilities.

Mysticism, often directly connected with the *mysterium* itself, the celebration of the Mass, is recorded in numerous places in Penco's book (a work of 533 pages and too much for the present discussion (see e. g. pp. 45 - 50, 252ff., esp. 258f.). De Lubac's classic work, *Corpus mysticum, Introduzione* and, especially for our subject, *Chapter I, L'Eucaristia corpo mistico*, brings a very considerable body of informations on the Eucharistic-mystic tradition in the early and medieval Church. Mysticism, directly tied up with the basis and center of religious life, the celebration of Mass, was a permanent factor in monastic life, whether or not it was accompanied by literary elaboration.

Among the numerous pertinent places cited by Penco, I am going to summarize one that seems especially relevant in our context (Penco, pp. 258f.), which he gives in Italian translation (I have not seen the Latin original, but do trust this Benedictine monk and highly rated scholar). Here is what Penco claims.

Towards the end of the Middle Ages, St. Gertrude (1256 - 1301), echoing the entire monastic tradition, addressed the Lord in terms that reflected a perfect equilibrium between liturgical piety and personal devotion (somewhat abbreviated): *Give me <the power to> offer you in a sacrifice of joy on the altar of my heart* [this term goes back to Gregory the Great], *allowing me to receive often, along with your elect, that sweet union and that uniting sweetness...* The entire Christian and monastic tradition continuously deepens this mysterious sealing, drawing always on new reflections on the unity of Christ's sacrifice and that of the Church. So far Penco on this text.

Let us consult Teresa's *Vida* regarding her more or less "mystical" exposures (page references to the cited edition). This task is not very straightforward, since her reports and formulations do not permit neat distinctions between what she claims to have seen, what she discerned in hazy vision-like experiences and what she in imprecise fashion believed to have heard from divine sources, in which case (the third type) she felt she was also witnessing divine presence. Often, she has her experience in a state of *arrebato* and *arrobamiento*, which mean more or less the same thing: a state of extreme exaltation or, to use the canonical term: *ecstasy*, which means a state of high emotional excitement beyond rational control (*Vida*, p. 306, just one example): Praying and beginning a hymn, she asked the

Lord to help her contenting him in everything, and she came into an ecstasy so violent that she felt alien to herself. This was the first time that the Lord granted her this grace of being in ecstasy (avoiding this term, she writes *arrobamiento*), and she heard him tell her not to converse with humans but with angels: *Habiendo estado un día mucho en oración y suplicando al Señor me ayudase a contentarlo en todo, comencé el himno, y estándole diciendo, vínome un arrebatamiento tan súbito, que casi me sacó de mí, cosa que yo no pude dudar, porque fue muy conocido. Fue la primera vez que el Señor me hizo esta merced de arrobamiento. Entendí estas palabras: "Ya no quiero que tengas conversación con hombres, sino con ángeles"...* (for religious-celestial conversations, see above, 1.4).

Experience of divine impact (*impetus*) comes to Teresa seemingly without perceptible cause and cannot be obtained by forcing oneself (*sobrenatural, porque en ninguna manera ella [alma] puede ganar aquello por diligencias que haga*) (p. 217); and having stated certain things, she feels they do not arise in herself but descend upon her from beyond. This happened to her many times (*veo claro no soy yo quien lo dice, que ni lo ordeno con el entendimiento ni sé después cómo lo acerté a decir. Este me acaece muchas veces*) (p. 221: according to Chicharro, one of the most frequently commented texts among all the Teresian writings). In Barbo as well as in Teresa we learn that these experiences cannot be accessed by human will; they come without human guidance.

Her use of the term *estotro* (*este otro*, the other <thing, cause>) belongs to the "language of mysticism" (Chicharro, *Introd. to La vida*, p. 309f.), referring probably to supranatural inspiration and ensuing experiences and understanding; but I do not see why her distinction between words and works (*obras*) should be especially "mystic", since this distinction is crucial in all of Roman Tradition; the Mass being the primary *opus bonum*, calling forth emotional vocabularies. Also *estotro es como obra*. It should be noted that the sacrifice of the Mass and the participation in it remains central and fundamental for whatever Teresa might do or write (as is completely normal in her surroundings).

Descriptions of stages in the approach to God appear, of course, earlier, such as in the writings of the Dominican Domenico Cavalca and the Benedictine Ludvico Barbo (see the *Bibliography*), to cite just two authors, both with books prefiguring Teresa's *Las moradas* and *Libro de la Vida*, Chapters XI to XXI. In the second step (*gradus*) of meditation, Barbo writes, we do not use words, only the heart, intellect and emotions, and we enjoy and are seized and carried off by the divine love (*gaudet et rapitur in amore Dei*), this, too, a prefiguration of Teresa's works and also of themes in Ignacio de Loyola's *Exercitia spiritualia*.

Barbo wrote *Ad monachos S. Iustinae de Padue Modus meditandi et orandi* (Santa Giustina was a major Benedictine congregation named after St. Giustina of Padua). In the next to the last chapter, *De tertio gradu contemplationis*, Barbo tells his congregation that with the contemplations one will reach *finally... such a great*

sweetness, such a great love of Jesus, that the soul will liquefy entirely at being hit by the divine and heavenly illuminations (*quod anima vestra tota liquefacta sentiens divinas et supertranscendentes illustrationes*). He ends his "textbook" in terms that do not differ much from Teresa's writings when it comes to contact with God. In the last chapter, with the heading, *Cannot be taught (Neminem docendum)*, he teaches his Benedictine congregation, with reference to the preceding chapter about the soul's experiences of sweetness and "liquefaction", how the soul becomes weightless in its inability to see such a light, enjoying the beauty and intellectual nourishment, so that all our senses become lame and the body rigid, etc. *Quibus intellectus succumbens dormiet pre stupore, cum vires suae non erunt potentes indagare abyssum tam indicibilis illuminationis, sed affectus totus succensus ascendet ad cor altum, Dei pulchritudinem degustando cum intellectus masticando, et fruatur cum tanto stupore et dulcedine quod sensus omnes apparebunt absorti et corpus totum propter mentis excessum apparebit rigidum...*

Without penetrating the subject of visionary experiences further than necessary in a discussion not primarily focused on earlier history, we can consult two sources, one concerning early writings (Francesconi's study) and the other from Teresa's time, Bellarmino's colossal *Controversiae* (to use an abbreviated reference; more closely, SL, *Patterns*, 2.2.12), Vol. III (published in 1592).

Francesconi's analysis of mystery-related texts, mainly in St. Ambrose, covers 39 pages, so that I have to limit myself to citing a few examples (numbers refer to his pages). Summing-up, he notes that the occurrence arises in the Scriptures and in the action of the Church herself, particularly through the sacraments. The emphasis tends to be on seeing with one's spiritual eyes, on vision, as much later in Barbo: *nemo potest resurrectionis videre gloriam nisi qui integrum mysterium trinitatis incorrupta fidei sinceritate servaverit* (p. 34). Or Christ is hidden in the mystery of the Passion, and man *videt autem magnum mysterium ... caro monitur, ut surgat*, etc. (p. 41). The dimension can be spiritual, bypassing bodily perception: *at ille surgens increpavit ventum. Quid est surgens? Quiescebat enim, sed quiescebat corporis somno, cum intenderet divinitatis mysterio... Etsi corpus dormit, operatur divinitas* - this could have been a quotation from Teresa.

Not only in the sacraments, but also in the Scriptures themselves, arises the mystical dimension: *omnia scriptura divina vel naturalis vel mystica vel moralis est* (p. 57). After this classic categorization, the theme is further developed and ends up with a little catalog (Francesconi's) of which, since the Italian is easy, I will quote a part in the original: *Gli oracoli profetici... nascondono - dice Ambrogio - "mysteria divinae cognitionis". Anche i pagani possono pervenire "ad cognitionem mysterii caelestis". In Cristo "sunt thesauri mysteriorum caelestium"...* (p. 60).

Bellarmino, in his *volume III*, dedicates some space to the matter, which for him is twofold: *mysterium* and *sacramentum* (column 18b). In fact, for him *sac-*

ramentum is Latin for the Greek-derived *mysterium* (col. 15b). He offers detailed analysis of *mysteria* concerning the Trinity (510a) and the Incarnation (539a), Baptism (540b,c), the two natures in Christ (106b) and of the sacraments (137c,d). In column 510a he considers the *mysteria* of the Trinity, the Incarnation, the resurrection of the dead; to cite some of the main headings.

Thus Bellarmino, in his massive defence of the Roman faith and institutes concentrates on the doctrinal and dogmatic principles. My rationale for bringing this material in at all, is to note that *mysterium* and related terms represented canonically Traditional issues with their origin in the Incarnation and the Sacrifice and focused on the Mass. The Mass liturgy and most of the exegeses on it evoke *vision* and presuppose focusing on *imagery*. Next, I shall try to evaluate Teresa's experiences in the contexts just recorded.

3.2 What Teresa saw

As any normal Catholic, Teresa actively venerated holy images (e. g., *Vida*, pp. 138f., 144: un *idolillo*). Thus, at her mother's death, she sought comfort from an image of the Virgin (*Vida*, p. 122). This tradition must have underpinned and intensified the faculty of handling mental objects and concepts in terms of visual configurations.

Vision and dependence on imagery, real or imaginary, has been considered crucial in knowledge acquisition and handling (from Cardinal Bellarmino in the sixteenth century to Einstein in the twentieth; references, esp. to studies by Holton and A. I. Miller, *Bibliography* here, and, generally, see *SL Burden*).

Bellarmino, following medieval tradition, was as aware as modern cognitive sciences of the role of mental as well as material images, affirming that *Whatever man attains cognizance of, whether by his senses or his intellect, he will attain this cognizance through images* (Bellarmino, *Disputationum*, Vol. II, Col. 698 E): *Homo quidquid cognoscit sive sensu, sive intellectu, per imagines cognoscit* (for the functions of religious images in the Roman Catholic tradition, see *SL, Some observations on liturgical imagery*; *SL, Iconography and ritual*, and *SL, Working with pictures*).

Visions are usually associated with communication with external forces. In Teresa's case, as in numerous other hagiographical traditions, starting with Saul becoming Paul, the interlocutor is the heavenly powers, and the communicative path is twofold. Either she finds herself in a transcendental conversation with God, or, as we have seen, she is spiritually but also corporally being approached, two occurrences that are often conflated (Saul -> Paul).

Let Teresa tell us more about her *visiones*, including her seeing the angel(s) with arrows, without insisting more on the obvious point that visions including hallucinations along with other mental experiences and various kinds of mental

outbreak, often are pathological symptoms (as we know today; Damasio, with substance and references).

Teresa gives detailed but obscure descriptions of visions and hearing voices, even feeling Christ walked next to her. On one occasion, while attending Mass, she had a vision of Christ *in all his humanity*, and of all the saved in heaven. This vision, however, was imaginary, *which I did not see with my physical eyes, rather with the eyes of the soul* (*Esta visión, aunque es imaginaria, nunca la vi con los ojos corporales, ni ninguna, sino con los ojos del alma*; *Vida*, p. 336). On another occasion (one among many), while reciting the *Veni, Creator*, she experiences an *arrobamiento* or nervously exalted feeling of direct contact with God.

Her narrative about a quasi-vision in Chapter XXVII, 2 (cf. also XXVIII, 9) is typical (as I see it) and deserves the space for translation and original.

*At the feast of the glorious St. Peter, saw I, while praying, or rather, felt, that Christ was close to me. I say this because I did not see anything, neither with my real eyes nor with my spiritual sight. But I understood - at least this is how it appeared - that whoever was speaking to me, was He.... It seemed to me that Christ was walking beside me, but I could not say in what shape, for this was not an imaginary vision [?]. I felt that He was on my right side, recording everything that I was doing.... I asked my confessor who wanted to know in what form I saw Him, and I answered that I did not see Him. He [the confessor] asked how then I could tell that this was Christ. I then told him that I did not know how, but that I could not doubt that He was close to me because I heard this and saw it clearly... (the essential formulations:... *vi cabe mí, u sentí, por mejor decir, que con los ojos del cuerpo ni del alma no vi nada, mas percióme estaba junto cabe mí Cristo y vía ser Él el que me hablaba, a mi parecer. .. Parecíame andar siempre al lado Jesucristo; y como no era visión imaginaria, no vía en qué forma; mas estar siempre al lado derecho, sentíalo muy claro...*). She tried, she tells us, to use several metaphors to describe her experience. Canonical experts reckon with several types of visions, and this was a *visión intelectual*, according to Chicharro (note 6, p. 325).*

I do not see how one can conclude anything from such passages regarding the processes leading up to such experiences, especially since we today know how not only brain damage but also various diseases and epileptic conditions can provoke visionary states and imaginary events (surveys in Guttenplan and brain studies in Damasio; see the *Bibliography*). Teresa was almost constantly ill, and even though she was able, like other "historical" individuals (Richelieu!), to be highly efficient in the midst of severe illness, we have access to no reliable diagnosis; except that her description at the beginning of Chapter VI leaves no doubt that she suffered from *una enfermedad del sistema nervioso de tipo epiléptico* (*Vida*, p. 149, Chicharro's comment in note 1). At one point she seemed close to dying and her grave was being prepared (*Vida*, 146f.). The saints, such as Joseph, would act

to help her (*Vida*, p. 154). Her most intense experiences with being hit by arrows take place in a state of severe physical suffering.

3.3 *Seeing things*

Teresa, we have noted, like many other contemporary writers on personal experiences, tells the readers about her many visions of Christ in his different aspects. Such *visiones* would be considered as expansions from the one crucial and basic vision, which is that of Christ's body in the Eucharist, intensified by her being constantly exposed to religious imagery, a relatively limited and constant choice on altars, lateral spaces in chapels and churches, and on walls in refectories, common rooms and cells. Her contact with real imagery (*Vida*, p. 157, *amiga de hacer pintar su [God's] imagen en muchas partes*) of course contribute strongly to shape and solidify her mental imagery; but this belonged to Catholic standard, and was not especially "Teresian", as Chicharro seems to imply (see also the notes on Cavalca and Barbo, above).

St. Gertrud again: whenever man daily, with desire and devotion beholds the hostia or sacred bread, in which resides the body of Christ sacramentally, then his merits increase in heaven, because of the eternal future vision of God...:... *quod quoties homo cum desiderio et devotione inspexerit hostiam in qua latet corpus Christi sacramentaliter, toties meritum suum auget in Coelo, quia aeternaliter in futura visione Dei tot sibi speciales delectationes alludent, quoties in terris cum devotione et desiderio inspexit corpus Christi vel etiam vellet videre si ponet cum rationabiliter impeditur...* (Dumoutet, p. 7).

The question of people being allowed or not to see with their physical eyes the consecrated host, had become a critical issue in the Roman world in the twelfth and thirteenth centuries (details in Dumoutet, abstract in SL, *Iconography and ritual*, p. 101f.). A related subject came in with Benedict XII's Bulla *Benedictus Deus* of 1336, establishing that *in Paradise the elect humans would see God face to face*, so that the divine essence would be known immediately (SL, *Iconography and ritual*, p. 123). Later, the papal statement became general dogma and thus reappears in Bellarmino's work. In his *De controversiis*, II, col.s 611 - 12. *Liber primus de beatitudine, et canonizatione sanctorum*, he refers to Pope Benedict XII's bulla, and repeats that the saints in heaven see God directly (col. 615): *Animas Sanctorum iam nunc frui Dei visione, demonstratur testimonio Ecclesiae*: that is, the Church by its Tradition, as the guarantor of truth.

But the distinction between physical, optical seeing and seeing mentally, is often not definite, especially so if we have information about these alternatives in autobiographical writings, such as Teresa's *Vida*.

Many writers, such as Barbo (see above) and Teresa (*Las moradas*) taught how to approach the heavenly powers by imagining visual experiences. We see the same phenomenon in Islam, were it was a controversial issue whether the

saved in Paradise would see God or not. Al-Muhâshibî's (died 844 A. D.) wrote the *kitâb al-tawahhum* which may be cataloged as *The book on the use of one's imagination*, for the great majority of the paragraphs in the lengthy text start with the summon to activize it: *tawahhum!*, *imagine!*. The reader, after having "imagined", with the author's rather insistent tutorship, the grisly details of Hell and the male-consumer delicacies of Paradise, ends up with facing the Throne: *and look, here they approach the Lord's Throne, and they see with their eyes his veils and his light...* (pp. 72, 198); *Imagine! Their [the saved's] assembly in beauty, dignity and grace - the illumination of their faces from the East [the sunrise], how they are illuminated by the light of the Throne of his [God's] glory and greatness, and his veils illuminated from the East* (Qurân, 204) (Roman, pp. 72f., Arabic Nos. 198 and 204. M. uses the word ^c*arsh* here, rather than the more lofty *kursi*) (further in SL, *Burden*, pp. 126f.).

The point of comparing uses or doctrines in the two religions is not to claim that one depends on or is "influenced" by the other, but that visualizing things is a common human expedient, a constant factor to be counted in regardless of any ideas about cultures or "periods". In religions that do not teach that divinity can be optically seen, mental visualization, whether or not supported by imagery, is a valid alternative.

We have been facing not one but several stories emerging from Teresa herself, from writings by her contemporaries, from modern scholarship and from the canonization process and later follow-ups on this. It is immaterial that I, for one, and on account of my upbringing, do not believe in some of the premises here, for I cannot exclude any of them; since this would mean that something is true and something is not ($T \sim F$); a paradigm inapplicable to matters thus vague. I may not believe in the story of the angel with the arrow, but I cannot claim it to be untrue. Scientifically soft issues above the levels of trivialities do not permit a neat distinction between *T* and *F*. In whichever way you evaluate these suggestions of mine, - as too far-fetched or simply silly - they serve a purpose that is sufficiently rational, to apply Simon's idea about *satisficing* or good enough propositions or statements. To amend Paul Feyerabend: *anything goes (provided it works)*.

Focusing on the most slippery among Teresa's recollections and ideas, that is, her visionary and other emotional experiences, the question arises of how to use the material she brings us, beyond the apologetical method of taking them more or less at face value (and possibly give them a philological treatment).

To be told that mystical tradition and canonical teaching reckon with three modalities of visions (Chicharro, *Vida*, in note, p. 336), is not very helpful, especially since the medical factors seem to leave us in no doubt about the reality of her experiences; another thing is their proclaimed celestial cause and origin.

In a preceding chapter, I asked whether her *Vida* is a textbook or a confession. It seems justified to say that Barbo's book is a teaching venture stating how through a set of degrees of contemplation, one may arrive at spiritual excitement and quasi-visionary experiences (foreshadowing the *Excecitia spirituaslia* of Ignacio de Loyola). In Teresa's case, the picture is not absolutely clear, for in chapters X to XXIII of *La vida* she *does* give instructions, as in her Chapter XI, concerning four degrees of prayer (*quatro grados de oración*, *Vida*, pp. 190ff.). My procedure so far should not be taken to imply that the procedures described pretend to being *sufficient*. They certainly are not, since there is no criterion available for defining sufficiency when dealing with a material for which approaches have to rely on approximation, often not even that, since approximation presupposes that we can *imagine* a terminal point.

Teresa's *Libro de la vida* can be interpreted both as a confession of spiritual experiences *and* as a book with instruction as the direct purpose. Her confessors might emphasise the latter perspective. One factor that makes it probably impossible to reach a definite conclusion, because the scope through the book is not constant but rather irregularly alternating, is of course her physical and hence also mental state of suffering.

How did her writing proceed? In pictures, we see her writing, facing us while the Holy Spirit hovers above her emanating light. Of course we never see the big male confessor seated next to her monitoring her writing. Nor do we have any information about the real influence or even collaboration on the part of her confessors, who she claimed "ordered" her to write. She was not an abbot like Barbo, just a nun, and it is likely that she was assisted in her work. It is useless to argue that her writings are a bit shilly-shallying, so she must have written everything alone. For her confessors would also grasp this point, wanting the product to look as if made by herself.

In some specific cases, as we have seen, the input is considered as an intervention from Divinity, in others from human psychological, social or other factors (labelled *human* on the graph). This is an example of how simple models, having to position and summarize, can display inconsistencies that all too easily escape verbal attention.

I would not let this issue worry me too much, since the main purpose of the present contribution is a theoretical one. My references to 2D models and math-derived notions mean (at least, as I see it) that some sort of crossover between disciplines, or rather, paradigms, has been ventured. Let me pursue this program.

PART IV INDETERMINACY

4.1 *Probable pictures*

In the preceding chapters, have I found the correct or approximately pertinent description of Bernini's Santa Teresa Chapel and picture of Teresa as a historical figure and of her religious, social and political environment?

Certainly not. I have presented *one probable picture or version* of the two subjects and the reliance of one of them on the other. And I have not *found* it, having in fact *created* it. *Creative power* is a recognized factor even in mathematics. Thus, for instance R. Bunn (in Grattan-G, pp. 224f.), gives a quote from Julius W. R. Dedekind (1831 - 1916): *We have a right to grant to ourselves such a creative power...*

Found or created, the combination of a space-occupying construction with a linear collection of texts (*Breviary, Vida*), is problematic in itself; the former presenting an obvious and visually noticeable *systemic character*, while the latter may be reformulated with this in view, testing the ever so vague structure manifest in the accounts for possible systemic potentialities. To anticipate a discussion regarding *limitations*, let me quote myself: *A limitation on my part is my inability to develop theory and methodology on non-systemic material. Theory does not spring from specific material but on the contrary determines how to handle it* (4.12).

Anyway, a space-occupying structure like the Chapel provides the obvious first choice for an approach to the issue.

My first task, then, is to return to Bernini's chapel (Fig. 1, 1.3) and take a closer look at it in order to sort out some unavoidable theoretical implications.

4.2 *Picturing the event*

Let us return to Teresa's arrow experience (1.2) and the model of *interaction patterns* (Fig. 1, repeated here as Fig. 2) to see how we can integrate it in a larger compass. Regarding Fig. 1, it must be kept in mind that this model, however, only focuses on the *internal situation at the celebration of Mass*. To facilitate the comparison I am going to develop, let me include Fig. 1 here.

The arrow event as described in the two sources of the *Breviary* and the *Vida* is a complex one (Fig. 2), in which separate threads meeting at points, have to be extracted and ordered in terms of some system. A 2D model is the obvious choice.

In Fig. 2, the depicted arrow event is integrated in a net of interacting components, one of them physically and mentally active (the celebration of Mass, with celebrant and congregation); counting in the recorded components with their underlying cognitive processes which are alive in the ritual and projected on to the pictorial program. the *actions* performed there, especially the celebration of Mass, but also other recitations and prayers, and, indeed, the *Breviary* recitations, must

be counted in as an integral component of the structure, without which the whole picture would incur a loss of significance and importance, both functionally and emotionally.

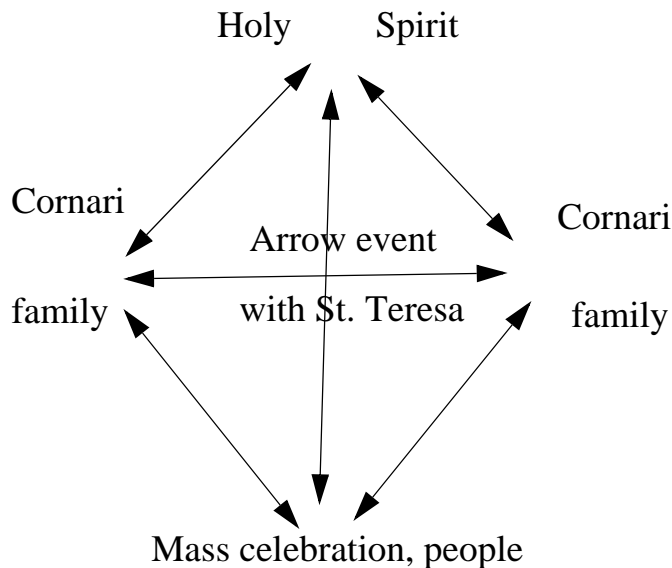


Fig. 1., repeated: Feature pattern in the Teresa chapel

Now let us look at things at a greater distance, referring to *Fig. 2*. The structure repeats, in spatially extended form, an old type represented by Pinturicchio's St. Bernardino's Chapel in the Araceli, Rome (1486; *see* 1.3). Some people among the congregation would be familiar with this tradition.

Attention to assumed *presence and activity* on the part of the

Holy Spirit, the angel and Teresa is indicated on the revised model. It is quite clear that in the seventeenth century the traditional conceptions of so-called sacred imagery was still alive and taken for granted by large sections among the congregations (for this medieval tradition, *see* SL, 1978), the clergy tending to overlook the alleged misbelief, which facilitated pastoral work: that not only the Spirit and the angels were present, but that they *and* the depicted saint somehow resided in the picture itself (SL, *Working*). That belief in real presence in images was still an issue, is shown, to cite just one case, by the fact that Pius V felt the need to prohibit the ancient custom, on Maunday Thursday, that the Pope washed the feet on the Scala Santa icon of Christ, in a rite taking place at the Colosseum.

Furthermore, we have to consider a complex *network* involved to different degrees in the project for the Chapel. In additional to the *Planners* (artist, authorities, influential citizens: *see* SL, *Patterns*, 3.1, for a more detailed argument).

Socially, politically and economically important sections of contemporary society must be counted in as more or less direct contributors to the project. Explorative prevision would also activate the estimate on the part of the clergy regarding likely reactions among the people. Great care, especially after the injunctions at the Council of Trent (terminated in 1563) had directed attention to the pastoral aspects of imagery in the churches.

In the light of *Fig. 2*, the Chapel emerges as a *dynamic system, with active internal and external connections*.

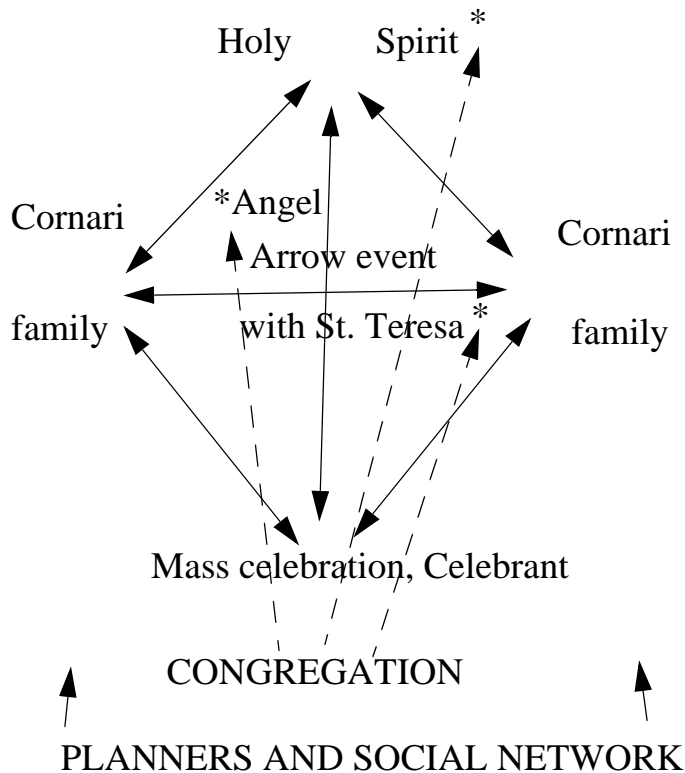


Fig. 2 (= 1 with additions) Interaction pattern in Bernini's chapel. Attention vectors indicated with broken lines. Asterisk: the represented figures (Spirit, Angel, Teresa) by most/many in the congregation taken as present and active. Authorities and social network are also indicated.

This means we have to consider the notions of *systems*, *2d3D models*, and *related disciplinary paradigms*. Prominent here are some among the *Social Sciences*, *Organization theories*, etc., including *Cognitive Science*.

These paradigms or disciplines rely on *associative* rather than *procedural* models (see 4.3); so that depending exclusively on them, would mean to remain within the area in which I started out. For the present assignment, I prefer to put the issue at a tougher test, so I shall limit the scope to typically procedural standards, primarily *Physics* and, through this field, *Mathematics*. I want to *compare alleged incommensurables, associative models with procedural models*.

4.3 Procedural and associative values and models

Before carrying on, I shall have to decide on the distinctions just stated. Working with models, both graphical and numerical, *negative* statements are more reliable than positive ones; saying, for instance, that this or that does *not* belong, instead of trying to describe and categorize all the things that probably do so; an effort that notoriously would take us for a ride. The following argumentation bypasses language and symbol philosophies from Wittgenstein to Kripke or Sears. But it will do as long as the terms are technically operative, responding to the needs in the present context.

Let me start with graphics with no manifest content and numbers. I would speak of pure quantities, or *Procedural* models whenever they are used *without any referents*, the former just lines and point without content, the latter such that it would be sufficient so long as any calculator could handle them (occasionally graphics seemingly without any content are used, without any inscriptions on them, but supplied with contents by accompanying texts; I do not have these in

mind). *Associative models - graphics or numbers -* are those for which the stated qualification is no longer valid, in other words, that they have any kind of notion or reference integrated in them, or, as just mentioned, related to them by comments. Needless to say, it is with associative models we will normally be working, be it some social science, physics or cognitive assignment. But it seems advisable to stick to the distinctions, among other things, so as not to involve ourselves in number theory.

In the next Chapter, some consequences of the distinction just made will be dealt with.

4.4 *Systems and imponderabilia*

The total picture of Bernini's chapel in Fig. 2 including the contributing professional, social, political and economic forces, represents a highly developed *system*. Thus, for us to utilize the model, the systems issue must be our next concern. This is a subject of high complexity and multiple levels of application, so I shall have to condense my account.

Normal human thinking about interrelations and categorization under some heading or umbrella concept contains the *buds of a systems awareness* (see SL, *A walk*, last section). The fact that many academic programs tend to curtail the incipient process, often to the extent that "systems" will be regarded as alien or even destructive, is another matter. The question is how to make the awareness emerge and become productive, possibly extracting *systemic properties in soft material*. This issue has been central, tentatively, in SL, *Burden* and, especially, *Patterns* and in some minor contributions, among them, SL, *Operational determination*).

Establishing a system or performing a systemization will often be a premise for handling analytically an object or theme and their position and role, causal or otherwise, within a given context or flow of events.

A system, we are told, *can be defined as a network of interrelated procedures that are joined together to perform an activity or to accomplish a specific objective* (FitzGerald and FitzGerald, p. 5). *A procedure is a precise series of step-by-step instructions...* or, for our purpose: reconstructions of intended actions.

A system can arise in *two main modalities*, the bottom-up and the top-down. The latter is most commonly known and utilized. We have had an example of a complex interplay between a number of factors in our model of the system in Bernini's Chapel when evaluated in its activated role (Fig. 2). Many authors consider a *Massenpunkt*, the gravitation center in any object or mass, and also *any object*, in terms of *system*, seeing that these bounded or limited entities will be subjected to our, the users', cognitive handling. Being thus processed, the object, large or tiny, will have neither stable identity nor fixed boundaries. Furthermore, systems come in two versions also dynamically speaking, a *static* one depicting a state or condition or situation or context, and a *dynamic*, which, while looking stat-

ic on paper or machine, includes or implies or involves certain actions or conceptual processes, especially interactions between the nodes in a network. Procedures and processes cannot be technically described as continuous entities and have to be grasped stage by stage (recall Einstein's "definition" of time: what you read on the clock).

We may be under the illusion of *finding* our systems (and so we do if they are delivered ready-made to us in scholarship exchange), but facing a material waiting to be analyzed, what we do is creating a *satisficing* (Herbert A. Simon's term) system by *intuitive systemization*. The way this process should work, is by trying it out to see if the proposed soft system yields a workable scenario, a heuristic procedure. As Simon noted, *decision-making processes* are essentially the same as *problem-solving processes* (stated in several of his writings, also his autobiography, *Models of my life*, p. 163).

Finally, there is the question of the coverage of a system. A *procedural* denomination is meant to refer to formal systems in which handling or operations on its parts are mechanical, independent on any *associative* content: any simple equation or matrix. The other, and more flexible, kind of system, already indicated, is the *associative* one, which integrates a wide range of facts, concepts and terms from reality and/or from imagination. The systems, however, have to be integrated into a procedural or formal system or mathematical operation.

These reservations arise when physical realities are associated with an equation or any other math formalism. Let me note what Philip Kitcher (pp. 217 - 24) has to say on systematization in math contexts. Again, he is concerned with something called *mathematical reality*: *Our understanding of mathematical reality is enhanced by achieving the same unification that we value in the natural sciences*. According to Kitcher, there are *two main types of systematization*: by *axiomatization* (dealing with axioms, definitions, proofs, etc.); and by *conceptualization*: including comments in verbal terms regarding interconnections, areas of validity and methodology. The tricky keyword here is *understanding reality*, for it squeezes us in the grip of associations without showing a way out again.

In Humanist circles we are used to look at mathematics, and hence to some degree also physics, as something absolute, empty of content, and hence alien. To eradicate this myth, it should be sufficient to cite Morris Klein's book *Mathematics. The loss of certainty*; or the following observations in by Gell-Mann (pp. 108f., Nobel Prize in physics). Under the heading, *The Special Character of Mathematics*, he notes that math is no science in the normal usage and that it *is more concerned with proving the logical consequences of certain sets of assumptions... and... the rigorous study of hypothetical worlds* (Lakoff, G., and Núñez,

R. E., *Where mathematics comes from. How the embodied mind brings mathematics into being*, New York 2000, bring other relevant perspectives). Mathematics, after all, start out from the awareness of the notion of dimensions and magnitudes and geometrical shapes (the square, the circle) and proportions, indispensable ideas in the contexts of architecture, only to end up who knows where.

There are numerous ways of estimating stereometrical shapes, such as architecture, in math terms; an elaborated case being Borromini's Spire on the church of Sant'Ivo alla Sapienza, the old university church in Rome (Sl, *Patterns*, 3.4 - 3.6).

Stripped of any accompanying notion, a graph or equation is entirely and sufficiently operated by following a set of general rules, *which remain constant, stable and unaffected whatever the associations of their subject may be that is being connected with them: a context and content independence*. Propositions as these have to be framed in the negative; positively expressed, they could lead us anywhere.

The issue about "how it works", i. e., our picture of its function or functions, is far from simple and readily understandable, either in the conceptual or in the technical sense. Gregory refers to the machine model. Localizing functions is always a tricky affair (Cf. Gregory, *Mind in science*, pp. 83f.).

4.5 Systems application

In a flowchart-like model (*Patterns*, 1.11), I have distinguished between *systemic argumentation* as a controlled process, on one hand, and on the other, handling of *imponderabilia*, that is, states of mind or objects that are (were) not observationally attestable, but which are subjective experiences recordable only in verbal (usually, literary) format, including pictorial or cognitive media. It would be inconsistent with my heuristic approach to esteem the latter, more fancy perspective, as less important than systemized approaches. Later on, we shall hear the crystallography physicist Cyril Smith (active at Los Alamos) proclaim artistic intuition to embrace quasi-systemic qualities (4.7, *Uncertainty*).

Often, however, systemic properties so to speak are lurking underneath phenomena that apparently defy definite organization or classification; and it is all to our advantage to try to sort them out. Cases of architecture and visual arts are obvious candidates. But in many cases, systemic properties have to be sorted out, if possible, by a certain amount of manipulations of the evidence. In a heuristic or modelling perspective, this is allowed.

In traditional Humanities, the maxim occasionally voiced, that *description precedes analysis*. As long as description develops in *verbal terms*, some amount

of analysis, hence also *theory*, is already implied. For a *linear* procedure must have a starting, a middle and an end point, thus settling certain priorities; a quandary eschewed by using 2D/3D (d for dimension) models. Theory often seems to be regarded as an extra appended to the "real" investigation or account; something one develops whenever the academic competition is particularly tough. In the sciences it is taken for granted that *no observation is theory-less*, or, more usually, that it is *theory-laden* (also familiar in sociology and social psychology), so that *theory precedes observation. It is the theory that tells us what we can observe - observation generally speaking is a complex process.*

This is what Alfred Einstein emphasized in a talk with Werner Heisenberg:.... *vom prinzipiellen Standpunkt aus ist es ganz falsch, eine Theorie nur auf beobachtbare Größen gründen zu wollen. Denn es ist ja in Wirklichkeit genau umgekehrt. Erst die Theorie entscheidet darüber, was man beobachten kann... die Beobachtung ist ja im allgemeinen ein sehr komplizierter Prozeß* (Heisenberg, p. 31).

This sequence can be reversed, and in our cases needs to be reversed in order to apply a test for the relations between *theory* and *observation*; provided that we do not forget that it *is* a reversal, and a provisional one. In physics, the subject was atomic sub-categories unavailable to visual inspection. In our cases most features are recorded, or recordable, in verbal or definite form. We are free to examine our historical evidence and develop theory on top of that, then so to speak invert the sequence in order to test the product for theory-potential.

A system acquires its meaning by being *used*, moving it whole or in parts, and moving elements inside it, in other words, *operating* on it. De Finetti, according to the highly instructive introduction by Bruno and Giorello, a contribution in its own right (p. 53, see below, 4.7), was aware of the importance of not only to study the genesis of concepts/ideas that are regarded as objective<-ly verified>, but also the road of change/alteration - that is, the process itself in addition to the stages in the development in which the concept emerges and manifests itself; this at least, is how I read the statement, which sounds: *non solo indagare la genesi dei concetti che si considerano oggettivi, bensí anche additare la via del cambiamento.*

4.6 Challenges

Something has happened that should be a challenge to the Humanities, but people there do not seem to have noted it, probably because most of the perspectives just discussed and those that will now be evoked, are considered as alien. University structures see to that.

Since the seventeenth century, four big innovations have been introduced.

The development of a new science of *physics* (Galilei playing a leading role); and of a new mathematics, the *Calculus*; of *quantum paradigms*, with its rather disrupting implications, as well as the use of *graphical models*, *flowcharts*, and other 2D or 3D formats in argumentation (no absolute novelty, figures having been in use for centuries).

Referring to the *quantum programs*, it should be noted that profound and generally accepted “truths” were being challenged, most of them relevant, at any rate at the epistemological levels, also for the verbal argumentation in the Humanities. Franco Selleri’s *Die Debatte um die Quantentheorie*, 3.ed., Wiesbaden 1990, gives a thorough and articulate account of the fundamental issues raised during the early development of *quantum theory*.

Armed with these tools and patterns of awareness, and some other minor ones, scholarship was enabled to face new conceptions of reality and objects that human intelligence could handle. But the debilitating structure of the universities often blocks the access for the Humanities to these novel perspectives and tools. The innovators themselves were not always products of universities: Galilei, Fermat, Kopenicus, Kepler, Turing, Wittgenstein, Planck, Einstein or Feynman did what the academic institutions had not taught them; Giordano Bruno emphatically so, calling the English professor *asini* because they blamed him for plagiarism, being unable to see the difference between his writings and those of Italian platonists. Heisenberg, when a young man, was told by his professor that physics was not an interesting subject, since only marginal problems remained to be handled. Just after that, in part through Heisenberg’s contributions, all of physics was turned upside-down.

4.7 *Uncertainty*

This heading I have borrowed from the title of David C. Cassidy’s excellent scientific biography of Werner Heisenberg, to whose works in quantum theory I shall presently turn.

The uncertainty predicament, as it was considered at the outset, later as a resource, when approximation became an accepted paradigm, started showing up with the many aborted attempts in terms of general epistemological principles, the definitive one by Giovanni Saccheri (1667 - 1733), to prove Euclid’s *Fifth Postulate* (parallel lines never converging; the impossibility of proving it lead to Lobaschewsky’s and Riemann’s non-Euclidean geometries); a subject discussed in Morris Klein’s book with the telling title, *Mathematics. The loss of certainty*.

In the 1960s, a colleague of mine asked the famous archaeologist, Gisela Richter, about the publication date of her new book on Greek archaic sculpture. She told him it would take some time, because *this is going to be a definitive book*, meaning that you could just look up in her chronology of undocumented pieces,

based on a kind of development idea, to find the more or less exact dates for them. A New York colleague told me, when I said there might be something the equally great Rudolf Wittkower would have to modify: *He doesn't need to change anything!* Today one would hardly hear such claims being affirmed. But the attitude lingers, supported by institutional, marketing and career mechanisms.

Theodore Dreiser, in *The financier* (1924), has shown, once and for all, how one series of specific and factual events can be interpreted very differently between the protagonists themselves. Of course, his ideas have been endorsed by modern research, such as in the cognitive science and according to several paradigms listed below. Thus, to restate my main point in this context: our only solution is to opt for some larger or smaller, but never complete, *spray of probabilities*.

But here the world comes in protesting: you should not propagate uncertainty! You cannot go to your publisher, and you cannot apply for a university position, with a list of possible answers to the problem at hand. *This is one of my reasons for distinguishing between traditional work for the publisher market and pioneering work on the Internet.*

Nevertheless, settling for some choice of probabilities, means that *uncertainty* is accepted, not necessarily as a disadvantage but rather as an asset.

To return to our main subject, *systems workable in math procedures*.

There must be no illusion that applicability of math ensures an objective and unique character to whatever is being in focus. This is so (at least as far as I can see) because the very connection of mathematics with some sort of reality, will provisionally, in the work process, strip the math of its property of *generality and its purely procedural character*.

We can learn from the Sciences to be attentive to logistic paths as well as procedures. Different equations can be fanning out from a basic one by virtue of their *applications*, while still remaining, in principle, the same equation.

Von Weizsäcker, under the heading, *The initial analysis of the significance of the fundamental equations (Erste Analyse des Sinns der Grundgleichungen, pp. 223f.)*, presents us with a *relatively simple second-degree differential equation* (not copied here) that normally, according to V. W., would be read as one representing accelerated *motion in classical physics*. The case is not that simple, however, partly because the scholarly terminology is diversified.

More fundamentally, now to outline in few word a lengthy and technical account going on for several pages, the equation as a whole *and* distinct symbols in it, some of them in a sense factual (*time*, for instance), have *various alternative or coinciding applications and relations to different functional contexts*.

In the famous conversation between Heisenberg and Einstein, another predicament came up, briefly stated, that in quantum theory one would have to

accept the conjunction between continuity or stability with discontinuity (Heisenberg, *Die Quantenmechanik*, pp. 36ff.).

Even more disturbing is the *Fundamental problem of Physics* (*das Begründungsproblem der Physik*, p. 232): *Can we determine the physical values operated in the equation without at first having ensured that the equation itself is valid? (Kann man die in die Gleichungen eingehenden Werte der physikalischer Größen bestimmen, ohne die Gültigkeit der Gleichungen schon vorauszusetzen?).* Another physicist notes that *. the laws of physics are quantum-mechanical, and quantum mechanics is not deterministic. It permits theories to predict only probabilities. The fundamental laws of physics allow in principle, only the calculation of probabilities for various alternative histories of the universe...* (Gell-Mann, p. 131; challenging observations on theories of Science in Giere).

If Nature does not produce absolute and definite data, why should we aim at definite conclusions, depending as we are on human language and reason, personal and contextual conditions, to say nothing about individual acumen and knowledge?

The world, as we know, and our lives, and thus also in historical contexts, are complex because cognition, conceptualization, ideas, goals, interests, as well as un-surveyable social, political and economic factors, enter into the picture. The recognition of this is reflected in art. Whereas earlier painters tried to establish a firm and recordable world, structured by the rules of the central perspective and laws of proportion, more recently artists have discovered that the probabilities are almost endless (in music noted already by Jean Philippe Rameau) and that you can only pick out some of them. And what you do pick out, is unstable: *The eye of the painter lends to the objects a human value and reproduces them as they are seen by a human eye, and this vision is mobile*, it is changeable; this was the way Pierre Bonnard expressed the idea. A modern physicist (the crystallography physicist Cyril Smith, active at Los Alamos) could suggest, some decades ago, that *artists intuitively, not precisely but somehow essentially, can perceive systems of great complexity in a way that could teach scientists something*. This was written before complexity became a fashionable concern all around (quoted in SL, *Iconography and ritual*, p. 180). The artistic approach has attracted wide interest in writings on science history (books cited in SL, *Patterns*, by, e.g., Arthur I. Miller and Gerald Holton), and in Ernst Peter Fischer's scientific biography of *Werner Heisenberg*, this issue is discussed at length.

Citing - once more! in this context., Bertrand Russell to the effect that *all exact science is dominated by the idea of approximation*, and referring to the calculus, while Georges Bidault offered the following advice: *Méfiez-vous des idées claires; elles sont rarement exactes*, I will cite Herbert A. Simon's theory of

bounded rationality (in his *Administrative behavior*; references in SL, *Patterns, passim*) and his *satisficing* paradigm, meaning that reaching a good enough proposition or solution is often both a sufficient and realizable objective (concentrated survey of both perspectives in Simon, *Models of my life*, pp. 165ff.); let me quote one passage regarding his Chapter 5 from *Models of man*, p. 156: *Adopting again a satisficing point of view, it [the Chapter] provides a sort of Darwinian model of rationality. Bracketing "satisficing" with "Darwinism" may appear contradictory, for evolutionists sometimes talk about survival of "the fittest". But in fact, natural selection only predicts that survivors will be "fit enough", that is, fitter than their losing competitors.*

The heuristic nature of procedures has to be taken for granted; just as we have to accept the same perspective for our conclusions. This attitude has a history behind it.

Carl Friedrich von Weizsäcker, in his *Aufbau der Physik*, enlarges upon the heuristic factor in seventeenth-century science, also among the clergy. As a protagonist in the early debates on the quantum theory, he would be open for such contingencies. Historically, he notes, there are *two distinct conceptions of motion*, both of which should be seen in a heuristic perspective, one *absolutistic*: Ptolemy, Copernicus, Kepler, Galilei, Newton; and one *relativistic*: Nicolaus von Kues (*Cusanus*) and Bellarmino (to stay with the old people, not counting Leibniz, Mach and others).

An adequate illustration of heuristic procedure is Isaac Newton's use of Kepler's planetary ellipses. An ellipse, to quote from *Webster*, is *a plane curve such that the sums of the distances of each point in its periphery from two fixed points, the foci, are equal*. In daily talk we might say that an ellipse is a kind of oval. When the distance between the two foci diminishes gradually, the curve approaches a circular shape; when melting together, we have a pure *circle*. Newton, in order to facilitate his work on the planetary ellipses discovered by Kepler, calculated them on a pure circle, seeing that in Kepler's ellipses, the foci came so closely together that the curve approached that of a pure circle. *Approximation* is the great idea.

With the appearance of quantum theory, fundamentals such as causality, reality, excluded middle and objective observation and the validity and correctness of something as apparently straightforward as *measurement* were, if not rejected, at least taken as contingencies not necessarily always reliable or indispensable. The Humanities can learn from this story to accept as a "fact of life" that definite conclusions are hard to come by, and that the foundations of our normal thought processes are unstable.

Uncertainty (*Prinzip der Unbestimmtheit* or *Unsicherheitsrelationen*) was the bottom-line subject in Heisenberg's professional achievement, a fundamental reality in quantum theory and mechanics (readable, semi-technical account in his

Quantentheorie und Philosophie and in his *Der Teil und das Ganze*). The initial stages of *quantum mechanics* provide a dramatic picture of the relativistic aspect of physical realities, while of course approximation is the fundamental factor in the *calculus* (SL, *Patterns*), which meant that approximation had to be accepted anyway. A central physical condition was the correlated notion of *uncertainty* regarding the relations between the position and the velocity of electrons (Heisenberg, 1979, p. 20: ... *man konnte nicht die beiden Größen gleichzeitig mit einer beliebigen Genauigkeit bestimmen*).

The debates in the 1920s about quantum mechanics produced a fundamental and critically challenging body of philosophy of science and of general philosophy as well. This story, as told by Polkinghorne, Selleri, E. P. Fischer and Camejo, as well as by Heisenberg himself (his chapter *Die Geschichte der Quantenmechanik*, 2006, pp. 3 - 23 in the book just cited; see the *Bibliography*; and others, is perhaps the best model one can find for science development as evaluated in an almost-totality of levels and possible contexts and ideologies.

Apparently Werner Heisenberg was one of the first in modern times to study and describe this kind of relativism and to elaborate the subject intended for a larger readership - in his *Der Teil und das Ganze* (1969) and other books. Ernst Peter Fischer, in his scientific biography of Heisenberg, quotes from the latter's autobiography his report of Niels Bohr's presentation of his planetary atom model at a seminar in Göttingen in June 1922 (the so-called *Bohr-Festspiele*). This case highlights the intuitive approach to physical realities and hence their vacillating status.

Bohr's actual model did not hold against criticism but proved seminal nevertheless in that it started *intuitive* thought processes in new directions (this is a contingency often ignored in the Humanities: that a mistaken proposal can generate new openings). Bohr may have been aware of this, for *It became immediately clear that Bohr had based his results not on calculations and proofs but on his feel <of the subject> and by guessing (Einfühlen und Erraten) and that he now was hard put to defend his views before the "High School of Physics" in Göttingen* (Heisenberg); and Fischer supplies: *One is lead to believe that Bohr better than anyone else knew how weak the basis was for his intuition concerning the atom* (Fischer, 52, 54, Heisenberg, 1969, 50f.). And yet, this was a decisive step in modern physics.

Probability physics (applied first to wave forms) meant two things: reliance on a spray of probable facts (in the scientific context, statistically determined), and something like a tendency or drive towards some specific physical event. *It meant, to quote Heisenberg, the quantitative conceptualization of the old term of dunamis or "potentia" in the philosophy of Aristotle. This lead to a strange kind of physical reality, which hovered between possibility and reality. (Sie bedeutete so etwa wie eine Tendenz zu einem bestimmten Geschehen. Sie bedeutete die quantitative Fassung des alten Begriffs der "dunamis" oder "Potentia" in der Philosophie des Ar-*

istoteles, Sie führte eine merkwürdige Art von physikalischer Realität ein, die etwa in der Mitte zwischen Möglichkeit und Wirklichkeit steht) (Heisenberg, 2006, 17ff.).

We should bear in mind some of the most cutting-edge factors and limitations that will generally reduce our expectations about how much we can achieve in terms of theoretical knowledge. Two categories of relativizing or even excluding propositions must be briefly noted.

First, there are things we simply *cannot do* - but which are attempted in quite a number of scholarly writings.

Some elements concern invalid statements. I have earlier (SL, *Patterns*, 4.2) attempted to dispel the illusion that we or anyone else can ever reach a so-called *genuine understanding*, as if this were one kind of either-or operation. Also being able to claim to know what someone (in the cited case, Descartes, in SL, *Patterns*) *really meant* or that the subject herself or himself could be sure about it. Both terms, *understanding* and *meaning something*, are notoriously unstable and manifold, leaving the understanding or reasoning subject, the historian as well as her or his "clients", in a vacillating position, dependent on momentary as well as long-term, often unpredictable, even unconscious, processes, situation-prompted purpose and contingent competence, to say nothing of academic career prospects. Thinking about *x* may bring forth *y* and *z*, through some vague recognition on my part, without the referents showing clearly up. On the other hand, in cases when my conception of some specific alternatives are appearing sufficiently obvious, this would be merely a sign of my limitations, if I continue unaware of there being a higher number of relevant alternatives. Should I rest contented with just one or a few of them, this would express my state of mind (perception or intelligence), not the state of matters.

The *second* category of factors challenge, not to say exclude, neatly formalized systems.

Several factors contribute to damping or blurring boundaries between *categories* (see the contribution by Eleanor Rosch, SL, *Burdens*, 4.1), between *systems and systemized pictures*, partly because human approach to matters accessible to systemization will often be influenced by sidetracking or inchoate or unfulfilled, even abortive, approaches (SL, *Patterns*, 4.3.6).

Even the notion of *truth* came under attack (not for the first time, really). In 1934, Bruno de Finetti wrote, among many other things, a book named *The invention of truth* (*L'invenzione della verità*; a novel by Marta Marazzoni with the same title!), published posthumously with important comments by G. Bruno and Giulio Giorello, in October 2006. An internationally acclaimed mathematician specialized in probability calculus, economics and decision theory, De Finetti adopted the Italian dramatist and prose writer Luigi Pirandello's version of relativism, succinctly expressed in a title, *Così è (se vi pare)*, this is how it is (if that is what you

think; Liv S.-L. leads my attention to another play by Pirandello, *Come tu mi vuoi*). Characteristically, De Finetti also quotes from Pirandello's novel *One, nobody, hundred thousand* (*Uno nessuno centomila*), the passus stating that *each of us have a proper inherent probability setup* and from *Six characters in search of an author*, 1922 (*Sei personaggi in cerca d'autore*): *We have to invent the world in order to find place for our awareness* (*Dobbiamo inventare il mondo per inquadrarvi le nostre sensazioni ...*). ... *eccovi dannati al meraviglioso supplizio d'aver davanti, accanto, qua il fantasma e qua la realtà, e di non poter distinguere l'uno dall'altra!* (condemned to the torment of facing, one next to the other, the ghost here and reality there, without being able to distinguish between them; *Così è* (*se vi pare*), *Atto secondo, scena prima*).

The growth of scientific knowledge occurs in parallel with philosophically proposed "principles", and while Science widens the field of knowable facts, enriching the network of relations attestable between them, Philosophy positively tightens the area of the accepted notions of truth, enriching the network of critical explanations in a drive steadily deeper (*La crescita della conoscenza scientifica va di pari passo con la critica filosofica dei "principi": ... [se] la Scienza allarga il campo dei fatti conosciuti, arricchendo la rete delle relazioni sorte fra essi, la Filosofia restringe il campo delle verità ammesse senza discussione, arricchendo la rete delle spiegazioni critiche e spingendola sempre più in profondo...*; De Finetti, *L'invenzione*. ed. cit., pp. 10f. and 70f.).

De Finetti also avails himself of Giovanni Papini's view of *pragmatism*, as it attracts all who think in order to act, and thus prefer provisional but usable truths rather than the inebriation from hyper-abstract words, such as *The Truth* (*...tutti quelli che pensano per agire, cioè che preferiscono verità provvisorie ma operanti, all'ebbrezza delle parole iperastrate*) (De Finetti, p. 13) (further: see 4.9), *Procedures*). Herbert A. Simon has developed this idea further with his *satisficing* paradigm.

Centrally applied terms like conceptualization and the *notion of concepts* also have been subjected to relativizing criticism (let me repeat parts of a paragraph from SL, *Patterns*, 4.3.7.).

The notion of *concept* that seems most constructive for my purpose, is the *operative, not definitional*, format developed by Hilary Putnam (1975, 271, details in SL, *Burden*, 166ff., 251ff.; see also N. U. Salmon, 31 f.; 93 - 157; Schulkin, 6ff.: these entries and the *following ones* are reported in SL, *Patterns*, also with the bibliographical references)

Concepts are not definable "things" or states, for they are processes, situation-conditioned *actions* (Hilary Putnam), namely, *abilities to handle* whatever may be at hand, in terms of knowledge or other mental operations, regarding particular subjects, objects, themes or similar. Which makes them relative and often unstable.

The operative status of concepts arose already with Einstein, albeit in another categorization and with a different name (SL, *Operational determination*). Next, we have to take into account that we rarely face a "new" situation without some preparation for it.

Personal Construct Theory (PCT) states that a person entering a new situation does this with some ideas about what is to be expected and this conditions her or his reaction to it and behavior in it (Downs, 77; Moore and Gollidge with other contributions on the same theme), for it lays out a general scenario in which conceptualizing abilities can be eventuated. The *Fundamental Postulate* in its simplest terms reads like this: *A person's processes [mental, conceptual] are psychologically channelized by the ways in which he anticipates events*. The scenario depicts possible future states in addition to previous and present ones.

The basic idea is anticipation of situations or events about to be met with; and it was introduced in the 1920s by the British neurologist Henry Head (a vast literature followed) (Canter, 13ff, also on Head and on Bartlett's remembering studies).

Thus, human *categorization* is essentially a matter of both human experience and imagination - of perception, motor activity, and culture on the one hand, and of metaphor, metonymy, and mental imagery on the other. As a consequence, human reason crucially depends on the same factors, and therefore cannot be characterized merely in terms of the manipulation of abstract symbols. One consequence of Lakoff's study (1987, *Women, fire, and dangerous things*), reported in SL, *Burden*, will be that certain common views of science will seem too narrow. Eleanor Rosch, also cited there, argues against the classical view that the properties defining a *category* are shared by all members (a view that rules out differences between more or less typical cases and also dependence on human factors in the categorizing process). She presented what are called *prototype effects*. Prototypes are subcategories or category members that give a special cognitive status - that of being a 'best example' - a reminder in a special context of Simon's *satisficing* paradigm, and, negatively, of Wittgenstein's *Sprachspiele*.

4.8 Making systems work

Concerning the *validity and applicability of a systematized picture* we may have construed, we may apply some tests now to be suggested.

My presentation of empirical (historical and social) material and building-up of theoretical and graphic models for treating it, aims to see in what directions and how far my kind of analysis (making verbal and graphic models converge under interdisciplinary - *Open-Source* - perspectives) can be brought to bear on the material. So for a system we have set up, I would say that elements in it and their interactions are *working satisficingly* (applying Simon's *satisficing* or "good

enough” notion), provided this can be expressed *both verbally and by 2D or 3D models*, in which case transition from one to the other appears to conserve consistency (thus, no absolute criterion).

This test also should ensure a sufficient degree of *control* of our results, if we add the following provisos regarding the nature of 2D/3D, i. e., graphic models.

A model may be considered *analytically productive*, provided that

- a) it brings surveyable order among elements, while evidencing problematic relations between them;
- b) it can absorb new data and insights,
- c) it can be modified, enlarged, or adapted upon intake of such resources, and
- d) if, by such intake (b, c) parts of it are disrupted, it still lends itself to repair and restoring of its consistency, and
- e) if the system under the circumstances just mentioned (a, b, c, d) is capable of generating new theories that demand and can elaborate new empirical material.

Analytic reality has to take, step by step in the process of analysis, some bounded and fixed form, be it in a list, a flowchart or in some kind of graphic model.

It is necessary to be aware of some problems attending the use of such models. Their consistency can only be assessed by the way they can be made to incorporate evidence and integrate with one another in a manner that seems to produce reasonable pictures of the cases at hand, in other words, that they can *work*. At the same time the model such as we see it, unavoidably fixes positions and interrelations rigidly, at least for each step, and this is strictly incompatible both with the idea that there may be several levels for the functioning of any specific factor or relation, and with the process-like character of any situation. But we have to let that go, seeking shelter under Simon’s *satisficing* umbrella.

Furthermore, there are requirements that model work should meet:

Our working with models should

1. - 1.1. require directly applicable documentation whenever this is available, 1.2. identify areas for which indirect contextual or hypothetically comparative evidence is available and 1.3. identify areas for assumptions derived either from 1.3.1. hypothetical systems consistence ("such and such a functional system would seem to involve, imply, require...") or 1.3.2. freely applied assumptions awaiting future support, confirmation, modification or refutation.
2. and should not blatantly violate or seem to contradict (who can tell in every case?) the rules and constraints of logic and mathematics whenever comparison here works. This has to be kept in the negative, since positive claims here will become philosophically much too vague.
3. The same should apply to the strategy's relation to the *emergent properties*

(SL, *Patterns*, 4.3.4) of science paradigms: the "more-than-the-sum-of-the-elements" properties; a term from machine technology: phenomena emerging from a complex structure or process that have no counterpart at any of the lower levels. Again a negative claim.

4. Argumentation must pass the systems convergence test outlined above.
5. When applied to humans, the model should tentatively not violate current tenets and constraints in the cognitive sciences. Negative again.
6. Then, and this is essential to my view, our strategy regarding a model should be conceived and elaborated in such a way as allow us to use it for describing and evaluating the strategies of other people and fields, be it for acceptance and partial adoption, modification or refutation. This means the strategy's capacity to accommodate other strategies so as to locate fits, misfits and incompatible factors.

For example, the traditional strategy of Art History as I learnt it at school, had no room for insights from, say, systems theory, management, information theory (even in its informal aspects) and so on. The strategy I have been attempting to develop pretends to accommodate such programs at least to such an extent that the relationships can suggest directions for further investigation. We should not expect more than that. On the other hand my strategy, as I see it, has no room for the traditional catch-words concerning the notion of "influence", "cross-fertilization" or "period": what my strategy can do with this kind of argumentation in order to accommodate it, is to change its structure into something very different (the receiving end of the notional and alleged "influence"-line using the "giving"-end product as a chosen resource).

7. The guiding systems serving as tools in the strategy, that is, lists or algorithms, visualizable charts, matrices and graphic models, may have their intrinsic, built-in dynamism - creating relevancies, priorities and directions for inputs and outputs. Pursuing the strategy must consist also in evaluating and if possible exploiting this methodological dynamism for the formulation of assumptions.

So far my seven points. They may seem rather simplistic philosophically speaking, springing out as they do from certain fundamentals that I accept axiomatically, just because they seem to function operationally.

A primary concern in this contribution has been to substantiate my claim that *there can be no one or numbered right description or interpretation of historical material* - only one or more proposals. This view seems to be in line with certain more or less modern paradigms which I shall now briefly recall. I can hear someone protest, Yes, but this is physics, that is not our field. No, but it does not take more than a little interest to acquire some of the essential notions and ideas in a

field whose epistemological setup, the softer paradigms cannot be allowed to disregard.

4.9 *Taking apart*

Having investigated certain historical circumstances and attitudes, and discussed principles of perspective and methodology regarding them, time has now come for an inward turn: *what have I done and how did I go about it?*

Certainly, concerning the structure of my investigation, I would say, *if you cannot tear apart your building, you haven't built it.*

Let me look at the biographical *Part I* (*Part III* extracts special features from this material) and see what happens.

The bottom-line *theory* is, simply (and not very originally), that I may use a *general hypothesis heuristically* in order to make the collected evidence and propositions or sub-hypotheses *work*. Meaning, *one*, that the structure thus created works if the items in it seem to buttress one another, *secondly*, that this comes about provided that all, most or the probably essential items, can be subjected to subsumption under some simple (at least, semantically so) *unifying proposition*.

Such a proposition often will fail in determinedness by being tied up in verbal accounts. In the present case, it is that Teresa in terms of her mental and worldly actions as reported in the available media, displays (or tries to) *a self-image primarily intended to defend herself from two threats, from her social surroundings and from the Inquisition.*

Here I can hear the late Herbert Simon proclaim (supposing he would have noticed this at all), as he has done on other occasions, that this is all hunch and no science.

Of course.

For all its complicated syntax and its semantic vagueness, the verbal analysis just presented describes *one* way of handling a historical material that eludes quantification or numerical and logical distinctiveness and corresponding manipulations.

4.10 *Theories of consistency*

Attentive readers will have noted that it doesn't take deep philosophy to see that the entire verbal flowchart I have taken them through, is fundamentally circular, or a kind of bootstrapping. But this cannot be avoided. We are unable to bypass ourselves and the basics of our apprehension of the world. In general terms, we cannot place ourselves outside, for evaluation, of the system or set of paradigms that constitutes the foundation of our thinking. In other words, we can never be consistent in absolute terms.

When is a theory logically consistent? if we can *assert that not every statement of the theory is also a theorem of the theory*, in other words, that at least one

statement in the field covered by the theory be *not a deduction* from the theory. Körner specifies: *In view of the correspondence (mediated by their embodiment in the same physical objects) between statement-formulae and theorem-formulae on the one hand, and statements and theorems on the other, we are entitled to say that to demonstrate formal consistency is at the same time to demonstrate logical consistency* (so far, p. 84).

Here is another formulation (<http://www.reference.com/browse/consistency?s=t>): Theories are consistent *which can talk about their own consistency, and which include the negation of the sentence asserting their own consistency*. The two key clauses, 1. *is not a deduction* from the theory, and, 2. *include the negation of the sentence asserting their own consistency*, must mean the same, namely that the field or area implies or produces at least one element outside the same area. In other words, a system cannot be evaluated from inside itself. The idea is elaborated also by Copi in his book on *Symbolic logic* (p. 164): *Any system is consistent if it contains (that is, can express) a formula that is not provable as a theorem within the system* (the so-called *Post criterion for consistency*). Intuitively, one may say that the cited formula enables us to see the system as a whole, from the outside.

Here it is tempting to evoke theories of consistency in math and logics (Körner, pp. 74ff., 84, on Kurt Gödel and his *incompleteness theorem*, or, better, theorem of *undecidability of formal statements*, pp. 91ff), but it would take us too far afield. Staying in real-world contexts, FitzGerald and FitzGerald (pp. 208f.), distinguish between *formal* and *informal* organizations, pointing out that *consistency is lost* when the latter takes over because of a more *ad hoc* focusing on a limited and separate goal, on *the job at hand*. Which *consistency*, however? If we could indicate directions for connecting these ideas at either end (?) of a scale, we might be enabled to develop some notions central to what I have labelled *open-source* approaches.

Investigation of analysis procedures and methodology will always remain fragmentary, the considerations on the preceding pages being no exception.

4.11 *Humanities and Sciences*

We need bridges between the Humanities and the Sciences (a prominent concern in SL, *Burden*), in which a register of *alternative interpretations and priorities* are accepted and taken for granted.

Seeing that the Sciences have much to offer in terms of methodological awareness, model use and clarity of argumentation, efforts within the so-called Humanities remain insufficient without trying to utilize these resources.

I believe we can safely claim that most of the methodological and theoretical procedures discussed in the present contribution, are rarely, if at all, used in the Humanities. Methodology is *one* field at which Humanities and Science (includ-

ing some of the Social Sciences) could converge. In the Sciences they take you through an argumentation; in the Humanities they try to convince you. The Humanities might opt for the former tack, not exclusively trying to demonstrate anything but attempting to structure an argumentation and rest contented with that. *Another one* is actively to develop the systemic features in the material at hand. The *third* is the experience that no "result" (beyond triviality) is definite, and the *fourth* (again beyond triviality) that one has to be prepared for accepting what I have called a *spray of probabilities*. Academic communities must evaluate procedure and theory rather than "convincing" results or conclusions (except intervention programs as in medicine etc.); "conviction" tells us nothing.

The most useful, in fact, indispensable, teaching from Science is that there are, above certain "factual" levels, no definite conclusions or results. If this is so in physics, how can we pretend things to be definite in our verbal handling of historical events and circumstances?

Let us go a bit further on with this characteristic of physics. Two - just two - factors remain constant. Planck's minimal quantum indicated by h (*the fundamental constant equal to the ratio of the energy of a quantum of energy to its frequency*, to quote from one of the many dictionaries), and the *law of energy conservation* (energy never being lost but can change format). Looking at current knowledge of physics, there are two phases, classical physics, which does not hold water, and quantum physics that repairs it at the cost of introducing a number of problematic and *uncertainty* features (surveys in Von Weizsäcker, *Aufbau*, pp. 287ff, especially 291 - 299; for the terms cited above, one may consult Alonso and Finn, *Physics*, Harlow 1992, *index energy*, *Planck's constant*).

Working on *historical or conceptual individuals* (or groups), the only option we have, is to forget about definite conclusions, considering several variants of their patterns of *actions* (mental, if accessible, and physical; as tentatively in the preceding chapters), their psychological setup being approachable only to literary intuition. That means including *events* involving them or provoked by them. An event can be truthfully described in different alternative terms; if not for definite reasons, at least because historical and conceptual human affairs will always defy attempts at settling on one particular description or explanation. Balzac in his *Illusions perdues* and Stendhal in his *Le rouge et le noir* both limit themselves to telling us what their protagonists are doing and saying - the only comprehensible aspect of a historical figure.

4.12 Limitations

The present contribution concerns procedure rather than substance, theory rather than "realities". What is often missing, is integrated use of theory and model and of system-oriented argumentation structure premised on consistent, at least stated, validity criteria. *People must get away from the idea that serious work is restricted*

to beating to death a well-defined problem in a narrow discipline, while broadly integrative thinking is relegated to cocktail parties. In academic life, in bureaucracies, and elsewhere, the task of integration is insufficiently respected (Murray Gell-Mann, Nobel Prize in physics, p.346). This is a statement by a physicist in the context of Science. In the Humanities, the significance of the term *integration* would hardly make sense.

Integration, however, is hardly ever a straightforward operation. We have to keep in mind, all the time, not only the *limits* imposed on our approaches and achievements, but also on ourselves. I, for one, find myself depending on some sort of a *system* in order to entertain the illusion that I am enabled to handle my material. Fortunately, we are not all of the same mould, one as valid as any other. I realize being unprepared for sorting out systemic, at least coherent, properties, in extremely complex and indirectly approachable material for which I find no available systemic models; such a material as has been so skilfully explored by Herbert Lindenberger, literary works by Trakl and Büchner, and the frightening intricacies of European Operas. Besides high-level scholarship, I believe such assignments require at least the two resources of artistic creative intuition, as described by the physicist Cyril Smith, and *expertise*, as displayed in Hubert Dreyfuss' famous picture: the capacity in argumentation to bypass a number of intermediate steps and arrive almost directly at workable propositions.

It is often hard to decide on what kind of material a systems view may be applicable. Positive propositions easily take us for a ride. The Roman Church has known this for centuries, so that the council statements usually were kept in the negative, since a negative proposition is more definite. *Whoever states so-and-so... is anathema, rejectable*. So let me state that whoever should claim that Georg Trakl's *Traum und Umnachtung* is potentially systemic, is anathema! I believe Herbert Lindenberger's splendid book on Trakl bears me out on this (*Georg Trakl*, New York 1971); see e. g., pp. 91f., 94, 108, for formulations that tentatively I would sum up by saying that in Trakl's poetry there is continuity at one level often yielded by virtue of discontinuity at another; but hardly a system.

We have to try to discover the *limits* to what we are attempting (I started my *Burden* with a reference to Paret's *Die Grenzen der Koranforschung*). Prose literature can help us here. Hermann Hesse's *Der Steppenwolf* offers a "portrait" of the man thus named that does not contain a single feature that could not be true, while at the same time remains too close ever to appear in traditional academic scholarship. I needn't be told that this was a result of fiction, for it is the model principle I am after; a model that is absurd when taken at face value, can be useful to illustrate a principle. The description focuses on the individual's *actions*, in words, doings and mental behavior. We can replicate such a method hypothetically, since whatever we do, it will be just one version.

In physics people have always published contributions that did not pretend to be definite or conclusive, but intended to bring useful bits of evidence and of directions for further research. My grandfather, Alfred Sinding-Larsen, published a paper on *Schichtbildung in Lösungen* in the *Annalen der Physik*, but this was nothing more than one little piece in the huge *Lego* edifice of the physics of that time (1920s). One reason - perhaps the principal one - why you cannot do such a thing in the Humanities, is that here you have no systems, you never know how observations are linked up with one another; and of course by evaluation of our *results* in fields without criteria for deciding what would constitute a satisfactory result.

In some fields in the Humanities, being aware of this alternative might have a positive effect. Let us say that there are published some n monographs on the Italian sixteenth-century painter *Paolo Veronese* the last twenty-five years. The predominantly stylistic-artistic features in focus are treated with some variations and different refinements from one book to the next, while remaining on the same track, each being an attempt at improving on the preceding one, and *each* of them pretending to offer a valid and tentatively *definite* interpretation. This procedure does not give the reader much of a direction and certainly it does not lead the scholarly field anywhere except displaying different tastes and career prospects among the professionals.

Now, let us say that *all* these books were written by *one* author (forgetting about publishing economies) and that they focused on the artist's decisions and recordable choices rather than some absolutist *status quo*. Then the outcome could be scientifically *satisficing*, to apply Simon's concept, and *realistic*, for we would be facing an array of probable interpretations, which, in turn, might lead on to a somewhat more systemic views on the subject; at least the outcome might have been a sorely needed debate on methodology and procedure.

Using such a framework (or frameworks) as I have just indicated, then, entails a process-like development of the key terms and models connected with it (them). Starting out with a list of fixed definitions, as Oleg Grabar does in his beautiful and interesting book on Islamic images and calligraphy, is not very helpful (*The mediation of ornament*, pp. xxiiif.). He tries to "define" an extremely comprehensive entry: *Decoration: anything applied to a structure or an object that is not necessary to the stability, use, or understanding of that structure or object*. Depending on one's application of the too general and vague terms for what "use" and "understanding" are being taken to mean, one might come to the conclusion that decorations don't exist.

No one in the sciences expect that a contribution should turn out to be highly original, decisive and standing; certainly not all three qualifications combined. The history of *quantum mechanics* offers a good example, with the intuitional approach of Niels Bohr, and the competition between Heisenberg's matrices and

Schrödinger's equations. No one would hope that this or that publication was the "best" one. But of course the scientific publication were and are focused on debate among the experts, not to be laid aside in the hope of a better one.

4.13 *The Open-Source Program*

The *Open-Source* norm is described above, at the beginning of the present *Part IV*. To put it briefly, any source or model can be used heuristically and experimentally to analyse any situation or process in real-life worlds and in our ideas and notions. Exploring the existing boundaries between the Humanities and the Sciences, taking into account what the latter field not only has to offer, but also how *open* the doors there really are, the boundaries should appear as much less forbidding. Of course I do hope that the present contribution can indicate some openings.

The attempts at situation analysis developed through *SL*, *Burden*, *Patterns*, *Working* and *Operational* will now be condensed in general programmatic research terms; proposing procedure-related theory and methodology paradigms. These lofty-sounding denominations should not scare off the reader, for the practical standards and procedures subsumed under them are very simple, while not entirely traditional.

Attempts at finding usable definitions notoriously take us for a ride, even to the extent of involving us in an infinite regress. We have to ask, instead, How the thing in focus *works*, how we can operate on it, finding the principles on which we can operate, how to develop and use various kinds of *models* (*SL*, *Patterns*, *Operational*, *passim*), especially in an *Open-Source* modality. To claim this is no novelty. In his *De anima et vita* of 1538, the Spanish Oxford professor Luís Vives stated as follows: *We do not seek to know WHAT the soul is, but rather how it is and how it works, and it is impossible to define in an absolute manner the whole range of its operations, because they emerge in our understanding gradually, piecemeal and fragmentarily (No nos concierne saber Que es el alma, sino más bien Cómo es y cuáles son sus operaciones...: Gilman, regarding La Celestina, in Rojas I., p. 13).*

Let me quote a related paragraph from *SL*, *Patterns*, 4.1.1.: A model must depict processes and provide space (configuration space, *Patterns*, 1.7) for changing conditions without being tied up with fixed definitions. Banesh Hoffmann's realistic comments upon the nature of definitions are very much to the point.

To define a vector we have to add to the above definition [here skipped] something analogous to "having broad nails", and even then we shall find ourselves not wholly satisfied with the definition. But it will let us start, and we can try patching up the definition further as we proceed - and we may even find ourselves replacing it by a quite different sort of definition later on. If, in the end, we have the uneasy feeling that we have still not found a completely satisfactory def-

inition of a vector, we need not be dismayed, for it is the nature of definitions not to be completely satisfactory... (Hoffmann, 1f.).

Nevertheless, he reminds us, we can *use* the vectors. Fundamentally, a model is generally usable if it locates *operations* and *objects subjected to them*, regardless of more or less literary descriptions of *what there is*.

I have been aiming at interdisciplinary (Open-Source) work, and focusing on *stepwise procedures rather than substance, methodology rather than results*. I have developed what I believe are relevant models in SL, *Working*, 4.1 (process model) and 5.1 (research trajectory) and SL, *Patterns*, 1.11, for a more articulate graph of a research process. But, *as* noted already, *there are limitations*; and it is a constructive effort to identify them in terms of methodology and theory as well as in terms of an author's, specifically myself, restricted personal competence; some of which I have pointed out, leaving the rest to readers.

4.14 *And Teresa?*

Can *Teresa's works* also be seen in a systems light? Probably, since, generally, they deal in *ideas*, even when she tells us about her *fundaciones*; and ideas are not states but processes. She is conversing directly with God and Christ or she reports on her interchange regarding confessors and nuns (her "sisters" and "daughters"). I am tempted to remind ourselves about the dramatic novelty of Fernando de Rojas' *La Celestina* I, (1499), which is entirely made up of verbal communication, as this has been noted by Stephen Gilman (p. 13). *Ideological patterns are candidates for systematization*. Since verbal communication depends on processes rather than states, these works should be available for translation into systemic pictures.

Also my insistence on the plurality of descriptions and interpretation, the uncertainty factor implied here, the combined use of graphical models and verbal argumentation, and the Open-Source approach, are themes not commonly met with in the Humanities.

There are *other features and devices* in the Sciences, and recorded in the present contribution, which also should be tested out on the Teresa case. But I shall let that go, since the present *general* survey certainly was started off by considering the historical accounts regarding her story and works, but would require more substantive evidence, beyond her case, before being tried out with a resemblance of completeness.

As stated already, my intention has been merely to suggest directions for historical research.

Part V SUPPLEMENTS AND BIBLIOGRAPHY

A minimal requirement for discussing the Breviary presentation of Teresa, is to make the Latin original available. I am using the *Breviarium romanum* of Malines, 1876.

5.1 *Teresa according to the Breviary*

In the following reprint of the Breviary for October 15, I have copied in extenso the reading and recitation texts, that is, the two *hymni*, the *oratio* and the three *lectiones*, all of them here labelled *readings*, omitting the rubrics except the titles of the quoted readings. I have introduced numbering by fives; in the hymns, every five verses; in the prose texts (which run continually in the original), I have subdivided the readings, considering the contents, into numbered paragraphs.

Hymnus

Die XV. octobris.

Regis superni nunti

Domum paternam deseris,

Terris, Teresa, barbaris

5. Christum datura, aut sanguinem.

Sed te manet suavior

Mors, poena poscit dulcior;

Divini amoris cuspide

In vulnus icta concides.

10. O charitatis victima!

Tu corda nostra concrema,

Tibique gentes creditas

Averni ab igne libera.

Sit laus Patri cum Filio,

15. Et Spiritu Paraclito,

Tibique, sancta Trinitas,

Nunc, et per omne saeculum.

Amen

Oratio

Exaudi nos, Deus salutaris noster; ut, sicut de beatæ Teresiæ Virginis tuæ,

20. festivitate gaudemus: ita coelestis ejus doctrinæ pabulo nutriamur, et piæ devotionis erudiamur affectu. Per Dominum.

Hymnus

Hæc est dies, qua, candidæ

Instar columbæ, Coelitum

Ad sacra templa spiritus

25. Se transtulit Teresiæ.

Sponsique voces audiit:

Veni, soror, de vertice

Carmeli ad Agni nuptias:

Veni ad coronam gloriæ.

30. Te, Sponse Jesu, Virginum,

Beati adorent ordines,

Et nuptiali cantico

Laudent per omne sæculum.

Amen.

Lectio IV

35. Teresia virgo nata est Abulæ in Hispania, parentibus tum genere, tum pietate præclaris. Ab iis divini timoris lacte educata, admirandum futuræ sanctitatis in tenerrima adhuc ætate specimen dedit.

36. Nam cum sanctorum Martyrum acta perlegeret, adeo in ejus meditatione sancti Spiritus ignis exarsit, ut domo aufugiens, in Africam trajiceret, ubi vitam pro gloria Jesu Christi, et animarum salute profunderet.

37. A patruo revocata, ardens martyrii desiderium eleemosynis, aliisque piis operibus compensavit: jugibus lacrymis deplorans, optimam sibi sortem fuisse præreptam.

38. Mortua matre, cum a beatissima Virgine peteret, ut se matrem esse monstraret, pii votii compos effecta est: semper perinde ac filia patrocínio Deiparæ perfruens.

39. Vigessimum ætatis annum agens ad Moniales sanctæ Mariæ de monte Carmelo se contulit: ibi per duodeviginti annos gravissimis morbis, et variis tentationibus vexata, constantissime meruit in castris christianæ poenitentiae, nullo refecta pabulo coelestium earum consolationum, quibus solet etiam in terris sanctitas abundare.

Lectio V.

40. Angelicis ditata virtutibus, non modo propriam, sed publicam etiam salutem sollicita charitate curavit.

41. Quare severiorem veterum Carmelitarum regulam, Deo afflante, et Pio Quarto approbante, primum mulieribus, deinde viris observandam proposuit.

42. Effloruit in eo consilio omnipotens miserentis Domini benedictio: nam duo supra triginta monasteria inops virgo potuit ædificare, omnibus humanis destituta auxiliis, quinimo adversantibus plerumque sæculi Principibus. Infidelium, et hæreticorum tenebras perpetuis deflebat lacrymis, atque ad placandam divinæ ultionis iram voluntarios proprii corporis cruciatus Deo pro eorum salute dicabat.

43. Tanto autem divini amoris incendio cor ejus conflagravit, ut merito viderit Angelum ignito jaculo sibi præcordia transverberantem, et audierit Christum data dextera dicentem sibi: Deinceps ut vera Sponsa meum zelabis honorem. Eo con-

siliante, maxime arduum votum emisit, efficiendi semper quidquid perfectius esse intelligeret.

44. Multa coelestis sapientiæ documenta conscripsit, quibus fidelium mentes ad supernæ patriæ desiderium maxime excitantur.

Lectio VI.

45. Cum autem assidua ederet exempla virutut, tam anxio castigandi corporis desiderio æstuabat, ut quamvis secus suaderent morbi, quibus afflictabatur, corpus ciliciis, catenis, urticarum manipulis, aliisque asperrimis flagellis sæpe cruciaret et aliquando inter spinas volutaret, sic Deum alloqui solita: Domine, aut pati, aut mori: se semper miserrima morte pereuntem existimans, quamdiu a coelesti æternæ vitæ fonte abesset.

46. Prophetiæ dono excelluit: eamque divinis charismatibus tam liberaliter locupletabat Dominus, ut sæpius exclamans peteret, beneficiis in se divinis modum imponi, nec tam celeri oblivione culparum suarum memoriam aboleri.

47. Intolerabili igitur divini amoris incendio potius, quam vi morbi, Albæ cum decumberet, prænuntiatio suæ mortis die, ecclesiasticis Sacramentis munita, alumnos ad pacem, charitatem, et regularem observantiam adhortata, sub columbæ specie purissimam animam Deo redditit, annos nata sexaginta septem, anno millesimo quingentesimo octogesimo secundo, Idibus Octobris, juxta Calendarii Romani emendationem.

48. Ei morienti adesse visus est inter Angelorum agmina Christus Jesus: et arbor arida cellæ proxima statim effloruit.

49. Ejus corpus usque ad hanc diem incorruptum, odorato liquore cicumfusum pia veneratione colitur.

50. Miraculis claruit ante et post obitum, eamque Gregorius Decimus quintus in Sanctarum numerum retulit.

5.2 BIBLIOGRAPHY

- **Adamson, M. W.** (ed.), *Daz Bûch von gûter spise (The Book of Good Food), A Study, Edition, and English Translation of the Oldest German Cookbook* [mid-fourteenth century], *Medium Aevum Quotidianum, Sonderband IX*, ed. G. Jaritz, Krems a/d Donau, 2000.

- **Bainton, R.**, *Vita e morte di Michele Serveto, 1511 - 1553*, Italian ed. by Adriano Prosperi, Rome 2012 (original version: *The Life and Death of Michael Servetus, 1511 - 1553*, revised ed. London 2005).

- **Barbo, Ludovico**, OSB, *Ad monachos S. Iustinae de Padua modus meditandi et orandi per Dominum Lodovicum [Barbo] Episcopum Tarvisinum compositus* (1443), ed. with parallel Italian text in Lodovico Barbo, *Metodo di pregare e meditare*, in *Scritti monastici editi dai monaci benedettini di Praglia*, IV, Treviso, ca. 1924.

- **Bellarmino, Roberto, SJ, (St. Roberto B.),** *Disputationum Roberti Bellarmini ... De controversiis christianae fidei adversus hujus temporis hæreticos*, II, Milan 1721 [1583], III, Milan 1721 [1592].
- **Bernini**, exhib. catalog: *Gian Lorenzo Bernini. Regista del Barocco*, ed. M. G. Bernardini and M. F. dell'Arco, Rome 1999.
- **Bruno, G.**, *see* De Finetti.
- **Calderón della Barca, P.**, and Lope de Vega, *El alcalde de Zalamea*, ed. and intnrod. by J. A. Franch, 2. ed., Barcelona 2000.
- **Canavaggio, J.**, ed. *Historia de la literatura española*, Vol. III: *El siglo XVII*, transl from French; Spanish edition by R. Navarro Durán, Barcelona 1995 (a team of French specialists covering the late sixteenth and the seventeenth centuries).
- **Cassidy, D. C.**, *Uncertainty. The life and science of Werner Heisenberg*, CA Un. Press 1985.
- **Castro, A.**, *El pensamiento de Cervantes y otros estudios cervantinos*, Madrid 2002 (republishation of earlier contributions by Américo Castro, edited and introduced by Julio Rodriguez-Puértolas).
- **Cavalca, Domenico, OP**, *Specchio di croce (1325 - 1340)*, corrected ed., Rome 1738.
- **Copi, Irving**, *Symbolic logic*, 5th ed., New York 1979.
- **Damasio, A. R.**, *Descartes' error. Emotion, reason and the human brain*, New York 1994.
- **Daniel-Rops**, *La reforme catholique*, 42 ed., Paris 1955.
- **De Finetti**, *L'invenzione della verità* (1934), ed. and *Introduzione: Scienza senza illusioni*, pp. 9 - 55, by Giordano Bruno (No. II!) and Giulio Giorello, Milan 2006. The Introduction is an important contribution in its own right.
- **De Lubac, H.**, *Corpus mysticum. L'Eucaristia e la chiesa nel Medioevo. Sez. quinta*, Ital transl. (I do not have the French original), Milan 1982.
- **Denzinger, H.**, and **Schönmetzer, A.**, *Enchiridion symbolorum definitionum et declarationum de rebus fidei et morum*, Freiburg i. Br. 1965.
- **Dumoutet, E.**, *Le Désir de voir l'Hostie et les origines de la dévotion au Saint-Sacrement*, Paris 1926.
- **Edwards, J.**, and **Lynch, J.**, *Historia de España, 4, Edad moderna. El auge del Imperio, 1474 - 1598*, transl from English, Barcelona 2005.
- **Feyerabend, P., I**, *Wider den Methodenzwang*, Frankfurt a/M 1983.
- **Feyerabend, P., II**, *Against Method. Outline of an anarchistic theory of knowledge*, London 1982 (1975): numerous editions)
- **Finetti**, *see* De Finetti.
- **Fischer, E. P.**, *Werner Heisenberg. Das selbstvergessene Genie*, Munich 2001, paperback Munich 2002.
- **FitzGerald, J.**, and **FitzGerald, A.**, *Fundamentals of systems analysis. Using structured analysis and design techniques*, 3. ed., New York 1987.

- **Francesconi, G.**, *Storia e simbolo. "Mysterium in figura": la simbolica storico-sacramentale nel linguaggio e nella teologia di Ambrogio di Milano*, Brescia 1981.
- **Galeazzi, G.**, and **Pinotti, F.**, *Wojtyla segreto. La prima controinchiesta su <Papa> Giovanni Paolo II*, Milan 2011.
- **Gell-Mann, M.**, *The Quark and the Jaguar. Adventurbes in the simple and the complex*, New York 1994.
- **Giere, R. N.**, *Explaining Science. A cognitive approach*, Chicago 1988 (paperback 1990).
- **Giorello, G.**, *see* De Finetti.
- **Gisolfi, D.**, and **Sinding-Larsen, S.**, *The Rule, the Bible and the Council. The Library of the Benedictine Abbey at Praglia*, College Art Association, Monographs, LV, ed. **Robert Nelson**, Seattle and London 1998.
- **González, I. F.**, *La letteratura spagnola*, Milan 2003.
- **Goodich, M.**, *The use of direct quotations from canonization hearing to hagiographical Vitae et miracula*, in Jaritz, G., and Richter, M., (eds.), *Oral history of the Middle Ages. The spoken word in context*, Krems and Budapest 2001, pp. 177 - 187.
- **Grattan-Guinness, ed.**, *From the Calculus to Set Theory, 1630 - 1910, An introductory history*, Princeton (NJ) 2000 (orig. London 1980); several authors, referenced in the present contribution abbreviated to Grattan-G.
- **Guttenplan, S., ed.**, *A companion to the philosophy of mind*, Oxford 1994/5.
- **Heisenberg, W.**, *Die Quantenmechanik und ein Gespräch mit Einstein*, pp. 22 - 41, in W. H., *Quantentheorie und Philosophie*, ed. J. Busche, Stuttgart 1979.
- **Heisenberg, W.**, *Der Teil und das Ganze. Gespräche im Umkreis der Atomphysik* (1969) , 6th. ed., Munich 2005.,
- **Hernández, D.**, *Qualitative representation of spatial knowledge*, Berlin 1994.
- **Holton, G.**, *Thematic origins of scientific thought: Kepler to Einstein*, rev. ed., Cambridge (MA), 1988.
- **Jones, R. O.**, *Historia de la literatura española, 2. Siglo de Oro: prosa y poesía*, translation from English, Barcelona, 1974, 1985, 2009.
- **Kitcher, Ph.**, *The nature of mathematical knowledge*, New York 1984.
- **Kline, M.**, *Mathematics. The loss of certainty*, new ed., Oxford 1980.
- **Körner, S.**, *The philosophy of mathematics. An introductory essay*, Dover Edition, New York 1986.
- **Lazarillo de Tormes**, *La vida de L. de T., y de sus fortunas y adversidades* (1554), ed. Victor García la Concha, Madrid 2007 (orig. 1940).
- **Lazarillo de Tormes**, *La vida de L. de T., y de sus fortunas y adversidades* (1554), ed. Francisco Rico, 22 ed., Madrid 2011.
- **Lope de Vega**, *Arte nuevo de hacer comedias* (1609), ed. E. García Santo-Tomás, 2nd ed., Madrid 2009.

- **Lope de Vega**, *Fuente Ovejuna* (1612 - 14), ed. Juan María Marín, Madrid 2009 (25. orig. ed. 1981).
- **Lope de Vega**, *Fuente Ovejuna*, ed. Fr. L. Estrada, seventh ed., Madrid 1996.
- **Lope de Vega**, *Peribáñez y el Comendador de Ocaña* (1614), ed. Juan María Marín, Madrid, 2003 (orig. ed. 1979).
- **Lord, E. A. and Wilson, C. B.**, *The mathematical description of shape and form*, New York 1984 (reprint 1986).
- **Miller, A. I.**, *Imagery in scientific thought*, Cambridge (MA) 1986, repr. 1987
- **Miller, A. I.**, *Insights of genius. Imagery and creativity in Science and art*, New York 1996.
- **Ott, L.**, *Grundriß der Dogmatik*, Freiburg i/Br 1970.
- **Penco, Gr., OSB**, *Spiritualità monastica. Aspetti e momenti*, Abbazia di Praglia (PD) 1988.
- **Putnam, H.**, *Mind, language and reality: Philosophical Papers*, Vol. 2, Cambridge (Engl.) 1975: (numerous reprints).
- **Quevedo, F. de**, *El buscón*, (1526), ed. D. Ynduráin, 23 ed., Madrid 2008.
- **Quevedo, F. de**, *Los sueños. Sueños y discursos...*, (1627), ed. I. Arellano, and C. Pinillos, Madrid 2008.
- **Rahner, H., SJ**, *Ignatius von Loyola als Mensch und Theologe*, Freiburg i/Br. 1964. A Collegeville (USA) republication in English of the theological chapters, available.
- **Rojas, Fernando de, I.**, *La Celestina. Comedia o tragicomedia de Calisto y Melibea* (1499), ed. D. S. Severin; Introduction: S. Gilman, Madrid 1969, 6, ed, 2008.
- **Rojas, Fernando de, II.**, *La Celestina. Comedia o tragicomedia de Calisto y Melibea* (1501), Russell, P. E., (introd. and ed.), 3 ed., Madrid 2008.
- **Roman, A.** *Une vision humaine des fins dernières. Le Kitâb al-tawahhum d'al Muhaâsibi* (Arabic text and transl.), Paris 1978:
- **Sarpi, Paolo**, *Istoria del concilio tridentino*, 2 vols., (London 1619) ed. R. Pechioli, Florence 1966.
- **Seiffert, H.**, and **Radnitzky, G.**, *Handlexikon zur Wissenschaftstheorie*, Munich, 1989 (paperback Munich 1992). This volume contains articles by a number of contributors. To simplify references, it will be indicated by Seiffert, p. *n*, pp. *nf*.
- **Simon, H. A.**, *Administrative behavior*, New York 1947, and later editions.
- **Simon, H. A.**, *Models of man*, New York 1957.
- **Simon, H. A.**, *Models of thought*, New Haven (CT) 1979.
- **Simon, H. A.**, *Reason in human affairs*, Stanford (CA) 1983.
- **Simon, H. A.** : *Models of my life*, New York 1991; with a complete list of his works.
- **Simon, H. A.**, *The sciences of the artificial*, third ed., Cambridge (MA), 1996.
- **Sinding-Larsen, S.** *Some observations on liturgical imagery of the twelfth century*, *Inst. rom. Nor., Acta*, VIII, 1978, pp. 193 - 212).

- **Sinding-Larsen, S.**, *Iconography and ritual*, Oslo/Oxford 1984.
- **Sinding-Larsen, S.**, *A walk with Otto Demus. The mosaics of San Marco, Venice, and art-historical analysis*, Institutum romanum Norvegiae, Acta, series altera, 8, 1992, p. 145 - 205.
- **Sinding-Larsen, S.**, *The burden of the ceremony master. Image and action in San Marco, Venice, and in an Islamic mosque*, Acta of the Norwegian Institute in Rome, 2000.
- **Sinding-Larsen, S.**, *Working with pictures in elaborated systems*, 2008, published by Institut für mittelalterliche Realienkunde, Krems a/d Donau (Österreichische Akademie der Wissenschaften), congress volume: *Ritual, images, and daily life. The Medieval perspective*, ed. G. Jaritz. Vienna 2012.
- **Sinding-Larsen, S.**, *Patterns and programs in premodern Rome - Shape, form and message systems: an interdisciplinary approach*, 2010, <http://ntnu.no/bht/arkitekturhistorie> (freely accessible, no copyright)
- **Sinding-Larsen, S.**, *Operational determination. Math in buildings and math statements about them*, www.uia.no/EMCO
- **Spaziani, M. L.**, *Pierre de Ronsard fra gli astri della Pléiade*, Milan 1998.
- **Teresa de Cepeda y Ahumada (St. Teresa de Jesús, de Àvila)**, *Libro de la vida* (1562), ed. Dámaso Chicharro, 14th ed., Madrid 2006.
- **Teresa de Cepeda y Ahumada (St. Teresa de Jesús, de Àvila)**, *Fondazioni* (1576) = *Opere*.
- **Teresa de Cepeda y Ahumada (St. Teresa de Jesús, de Àvila)**, *Las moradas* (1577), ed. J. A. Franch, Barcelona 1967.
- **Teresa de Cepeda y Ahumada (St. Teresa de Jesús, de Àvila)**, *Opere*, authorized Italian translation: *S. Teresa di Gesù, Opere*, 41 - 436, ed. P. Egidio di Gesù, Rome 1969: orig. Spanish ed. P. Silverio de S. Teresa, Burgos 1954. Including, pp. 1071 - 1383, *Fondazioni* in Ital. (I have not had access to the Spanish original).
- **Weizsäcker, C. F. von**, *Aufbau der Physik*, Munich 1988.
- **Wilson, E. M., and Moir, D.**, *Historia de la literatura española, 3. Siglo de Oro: teatro*, translation from English, Barcelona, 1974, 1985, 2008.
- **Wittgenstein, L.** *Philosophische Grammatik*, ed. Rush Rhees, Suhrkamp Werksausgabe, vol. 4, Frankfurt a/M 1984.
