

New light on the Galileo affair [\(1\)](#)

Mariano Artigas

Published in [Metanexus](#), 30 April 2002

This is a written version of a lecture delivered at the Metanexus Institute (Philadelphia), on Monday 4 February 2002, and at Columbia University (New York), on Wednesday 6 February 2002, on a document related to the Galileo Affair, discovered by the author in 1999 in the archives of the Holy Office in Rome. [\(2\)](#) [\(3\)](#)

More elaborate accounts of the discovery of document EE 291 and its meaning for the Galileo Affair have been published by Mariano Artigas, Rafael Martínez and William R. Shea: [\(4\)](#) [\(5\)](#) [\(6\)](#) [\(7\)](#)

Mariano Artigas, Rafael Martínez and William R. Shea, “New light on the Galileo affair?”, in: *The Church and Galileo*, edited by Ernan McMullin (Notre Dame, In.: University of Notre Dame Press, 2005), pp. 213-233.

Mariano Artigas, Rafael Martínez and William Shea, “New Light in the Galileo Affair”, in: John Brooke and Ekmeleddin Ihsanoglu, editores, *Religious Values and the Rise of Science in Europe* (Istanbul: Research Centre for Islamic History, Art and Culture, 2005), pp. 145-166.

Mariano Artigas, Rafael Martínez y William R. Shea, “Nueva luz en el caso Galileo”, *Anuario de Historia de la Iglesia*, 12 (2003), pp. 159-179.

“Un inedito sul caso Galilei. Presentazione”, *Acta Philosophica*, 10 (2001), pp. 197-272; Mariano Artigas, “Un nuovo documento sul caso Galileo: EE 291”, pp. 199-214; Rafael Martínez, “Il manoscritto ACDF, *Index, Protocolli*, vol. EE, f. 291 r-v”, pp. 215-242; Lucas F. Mateo-Seco, “Galileo e l’Eucaristia. La questione teologica dell’ACDF, *Index, Protocolli*, EE, f. 291 r-v”, pp. 243-256; William R. Shea, “Galileo e l’atomismo”, *Acta Philosophica*, pp. 257-272.

[Text](#)

[Index of slides](#)

[Full presentation](#)

Text of the Philadelphia-New York Lecture

In her recent nice book *Galileo’s Daughter* (Walker & Company, New York 1999, pp. 231-232), Dava Sobel has written: “There was only one trial of Galileo, although legends - even experts and encyclopaedias- often speak of two (...) There was only one trial of Galileo, and yet it seems there were a thousand (...) No other process in the annals of canon or common law has ricocheted through history with more meanings, more consequences, more conjecture, more regrets. The confusion over Galileo’s trial (...) derives from the abstruse nature of the trial itself.” [\(8\)](#)

The confusion does not derive from lack of documents. We have a dossier containing the documents of the trial. The depositions of Galileo are carefully recorded. We have many letters from or to Galileo, describing the events and their circumstances in detail. Yet, it is difficult for us to perceive those events in an objective way. We live in a scientific civilization, based on the progress of empirical science. Galileo is the father of

modern empirical science, and we tend to perceive his trial as a trial against science itself. Galileo's contemporaries saw him under a very different light.

Galileo became famous only in 1610, when he published his celebrated celestial discoveries. (9) (10) He was already 46 years old. Then he began to argue in public in favor of Copernicanism. His discoveries supported Copernicanism, but neither he nor anyone else was able to produce definitive proofs. The new science as we know it did not exist yet. It only took shape 80 years later, in 1687, when Newton published his *Mathematical Principles of Natural Philosophy*. Galileo's contemporaries saw him as a brave brilliant professor, but he did not publish his main scientific work until 1638, five years after the trial; his writings arguing for the compatibility between Copernicanism and the Scriptures had not been printed at the time of the trial, and were known by very few people. The clash, as it was perceived by many of his contemporaries, was not between science and religion. There were, on the one hand, the traditional ideas about the world, developed during two thousand years by many illustrious scholars, and, on the other hand, an unproven hypothesis which openly contradicted commonsense experience and the literal meaning of a number of passages of the Scriptures. Galileo was told to treat Copernicanism merely as a mathematical tool, useful for the prediction of celestial phenomena. But he seriously thought that it was a true theory, and he tried to prove it.

The publication of Galileo's *Dialogue Concerning the Two Chief Systems of the World* in 1632 provoked the trial in 1633. (11) The charges against Galileo reduced to one, namely that he had disobeyed the orders he had received in 1616 not to teach or defend Copernicanism. (12) When he arrived to Rome in 1633, he immediately celebrated his 69 anniversary, and he desired to make his case, arguing in favor of Copernicanism. His friends wisely advised him to behave differently, showing himself ready to accept anything the Holy Office would desire. Personal circumstances played an important role. It was not only Sacred Scriptures what was at stake. Some people had persuaded Pope Urban VIII, the great friend and admirer of Galileo, that his friend was not as innocent as he thought. He not only had disobeyed the 1616 injunction. He also had ridiculed the Pope himself, placing the Pope's favorite argument against Copernicanism in the mouth of Simplicio, the simpleton Aristotelian who was always the loser all along the *Dialogue*.

When a campaign of attacks is launched, very often all kinds of weapon are used. There is nothing new in this. Galileo had to suffer also this kind of attack. In 1615 he went to Rome because he knew that he had been accused before the Holy Office. The main charge was that he supported Copernicanism, but in Rome he realized that his enemies had represented him as suspect of not being a good Catholic. The Congregation of the Index included Copernican books in the Index of Forbidden Books on the ground that they clashed with the Sacred Scriptures. He was able, however, to show that he was a sincere Catholic, and the Pope personally reassured him that accusations in that line would not be taken into account.

Indeed, Galileo was always a Catholic who did not see any contradiction between his science and his faith, and he was right. He tried to prevent the damage that the Church could suffer if the authorities condemned Copernicanism. After the trial, in a letter to Nicolò Fabri di Peiresc, dated February 21, 1635, he wrote: "I have two sources of perpetual comfort: first, that in my writings there cannot be found the faintest shadow of

irreverence towards the Holy Church; and second, the testimony of my own conscience, which only I and God in Heaven thoroughly know. And He knows that in this cause for which I suffer, though many might have spoken with more learning, none, not even the ancient Fathers, has spoken with more piety or with greater zeal for the Church than I” (*Opere di Galileo*, National Edition, vol. XVI, p. 215). [\(13\)](#)

There are records of the activity of Galileo’s enemies from 1610 until the end of his life. Ludovico delle Colombe, a Florentine of which very little is known, was the head of a group that very early tried to fight Galileo on scientific grounds, using also for the first time against him arguments taken from the Scriptures. Other important opponents were the Dominicans Niccolò Lorini and Tommaso Caccini: Lorini denounced Galileo to the Holy See in 1614, and Caccini, who had preached against Galileo from the pulpit in Florence, went to Rome to support the denunciation. Caccini continued to conspire against Galileo in the years following the condemnation of Copernicanism in 1616. Afterwards two Jesuits must be named, Christopher Scheiner and Orazio Grassi. Only, in these cases it was Galileo who agitated the waters, provoking unnecessary polemics that spoiled the excellent relationship entertained by Galileo with the Jesuits before.

The polemics between Galileo and Grassi originated with a lecture that Father Grassi published on the occasion of the appearance of three comets in 1618, and developed in a series of writings where many issues were raised that had no relation with the comets. One of them was *The Assayer*, published by Galileo in 1623, a brilliant book where Galileo treated a great variety of subjects. [\(14\)](#) Galileo’s prose is one of the finest achievements of Italian Baroque. *The Assayer* is a masterpiece of style and was wildly acclaimed not so much by scientists as by poets and writers. It is here that we find the often quoted passage on the book of nature written in the language of geometry: “Perhaps Sarsi (the pen name used by Grassi) thinks that philosophy is a book of fiction created by one man, like the *Iliad* or the *Orlando Furioso*, books in which the least important thing is whether what is written in them is true. Mr Sarsi, this is not the way matters stand. Philosophy is written in that great book which ever lies before our eyes - I mean the universe - but we cannot understand it if we do not first learn the language and grasp the symbols in which it is written. This book is written in mathematical language, and the symbols are triangles, circles and other geometrical figures, without whose help it is humanly impossible to comprehend a single word of it, and without which one wanders in vain though a dark labyrinth.” (*Opere*, VI, 232) [\(15\)](#)

We also find in *The Assayer* some reflections on the nature of physical qualities. Galileo explained away the objectivity of those qualities (like color, smell, and so on). They would only be the result of the action of atoms on our sense organs. Apparently this has nothing to do with theology, but Father Grassi, in the book he wrote replying to Galileo, accused him as if his theory of physical qualities were not compatible with the Catholic doctrine on the Eucharist. [\(16\)](#) The Council of Trent, following a tradition of several centuries, had used the word “transubstantiation” to declare that in the Mass, after the consecration, there were no longer the substances of bread and wine, but the Body and Blood of Christ, remaining the “species” of bread and wine, “species” meaning in this context the appearances of bread and wine. In the Aristotelian philosophy, to the concept of “substance” corresponds the concept of “accident”: color, flavor, and so on, are accidents of material substances like bread and wine. Now for Galileo these accidents were just names, and Grassi aired the concern that such a view was difficult to reconcile with the Catholic teaching on the Eucharist (it is easy to notice, however, that

the Roman Catholic Church does not use here the concept of “substance” in a philosophical way, but only to express that after the consecration there are no longer bread and wine but the Body and Blood of Christ, and also, in this line, the Council of Trent did not speak of “accidents,” but of “species,” according to the desire of the Fathers of the Council who did not wish to enter into disputes of that kind).

The publication of *The Assayer* in 1623 coincided with the election as Pope of Cardinal Maffeo Barberini, an excellent friend and admirer of Galileo, so much so that the publishers, the *Academy of the Lynxes*, one of whose first members was Galileo, could include at the beginning of the book a dedication to the new Pope Urban VIII. (17) Galileo, who was already 59 years old, communicated to his close friend the noble Federico Cesi, founder and president of the Academy, that the pontificate of the new Pope could be a unique opportunity to publish his ideas on Copernicanism. Galileo went to Rome in 1624, he was received very friendly by the Pope, six times in a short time. Although he realized that he should treat very carefully the issue of Copernicanism, the atmosphere was very friendly.

Nevertheless, shortly after his return to Florence, Galileo knew something about a denunciation to the Holy See of his theory of physical qualities. He did not know exactly, and asked his good friend Mario Guiducci who was then in Rome. Guiducci reported several times that nothing at all apparently existed about that denunciation. But, as usually, Galileo was well informed. Finally, in a letter dated on April 18, 1625, Guiducci could tell Galileo something about the denunciation. Nevertheless, according to Guiducci, the reason was not Galileo’s theory of physical qualities but the motion of the Earth.

Guiducci had received this information from their common friend Prince Cesi. (18) According to his report: “some months ago at the Congregation of the Holy Office, a pious person proposed to prohibit or correct *The Assayer*, charging that it praised the doctrine of Copernicus with respect to the earth’s motion: as to which matter a cardinal assumed the task of informing himself about the situation and reporting it; and by good fortune he happened to hand over the case to Father Guevara, father general of some sort of Theatines, who I believe are called Minims, and this father then went to France with the Signor Cardinal Legate. He read the work diligently and, having enjoyed it very much, praised and celebrated it greatly to that cardinal, and besides put on paper certain defenses, according to which that doctrine of motion, even if it were held, did not seem to him to be condemnable; and so the matter quieted down for the moment” (*Opere*, XIII, 265: translation taken from P. Redondi, *Galileo Heretic*, Princeton University Press, 1989, p. 139).

The report is quite mysterious because it contains several confusions, which refer not only to the Theatines, but to the essence of the accusation. In fact, in *The Assayer* there is no allusion to Copernicanism, and Galileo’s information referred to a denunciation regarding physical qualities.

In the 1980s, Italian historian Pietro Redondi suspected that perhaps the report by father Guevara could be found in the Archives of the Holy Office, and asked the Congregation for the Doctrine of the Faith, the name of the present Roman Congregation which succeeded the Holy Office. He was told that a paper existed on this issue, and eventually he was allowed to consult it. The Archives were not open at the time, and he

was allowed to consult only that particular piece, a document placed in a volume named EE. This was June 11, 1982. He could not see the other pieces of the volume, or anything else apart from that particular document, which he named G3 because at the top of it we read G3 (we do not know what it does mean.) (19)

G3 resulted to be an anonymous and undated denunciation of *The Assayer*, centered on Galileo's doctrine of physical qualities. Redondi interpreted that this was the denunciation that Galileo was asking for to Guiducci. Now, Guiducci's confusion could be explained very easily. The section of *The Assayer* containing Galileo's theory of physical qualities refers to the motion of the atoms as the cause of heat, therefore the information, passed through several people, took for granted that the "doctrine of motion" referred to the motion of the Earth, which was the cause of Galileo's troubles with the authorities of the Church.

Redondi worked out a whole reconstruction of the situation and the characters, attributed the authorship of G3 to Father Grassi, and wrote a book explaining all this (*Galileo Heretic*, Princeton University Press, 1989).(20) In that book, Redondi went so far as to propose a reinterpretation of the Galileo Affair. According to Redondi, the central charge against Galileo was the denunciation contained in G3, but Pope Urban VIII, carried by his friendship towards Galileo, was able to center the trial "only" on the charge of the motion of the Earth, a minor charge if compared with the doctrine of the Eucharist. This reinterpretation has not been approved by the Galileo scholars, it is too forced. Redondi claimed afterwards that the core of his work was not that, but the reconstruction of the problem and the claim that the Archives should be opened, so that the issue could be investigated further.

In the same years, the Commission appointed by Pope John Paul II to revise the Galileo Affair also asked that the Archives be opened. Finally, they were opened for researchers in 1998. I was there in November 1999, working on a different problem. But my interest in Galileo had increased in those years. I remembered the G3 affair, and moved by curiosity I asked the EE volume because I wanted to see the original document. Finally it was there, before my eyes. Then I also remembered Redondi saying that he had not been allowed to consult anything in that volume except the G3 document. I thought that I was more fortunate. I could see the rest of the big volume. I could try to find out whether there were in it other documents written by the same hand, so that the mystery about the authorship could be solved. I read the Index at the beginning of the volume, and, to my surprise, I realized that G3 was not included there, although it obviously was in the volume, occupying sheets 292 and 293. A new mystery. Then I had a look at the other documents in the volume, trying to find out some whose calligraphy was similar to that of G3.

At some moment, I was busy trying to read the document previous to G3. Not an easy task. It was folded, because it was too big. I was afraid of tearing it, because the manipulation of those papers of the 17th century was not too easy. Finally I was able to display the document before my eyes, and I begun to read it. It was not easy, it was a Latin manuscript not too polite and very old, and some passages could not be read easily at once. When I was able to read it, I felt a new, much greater surprise. Although Galileo was not mentioned by his name, the document referred to him. More precisely, it was connected with the denunciation contained in G3. This document was also

anonymous and undated. Apparently it was produced by someone who worked for the Congregation of the Index.

Here a small parenthesis must be done. The volume EE belongs to the Archives of the Congregation of the Index of Forbidden Books, a Congregation different from the Holy Office or Roman Inquisition. The Holy Office was the first among all the Roman Congregations, the president was the Pope, and it dealt with all kind of affairs related to the faith. The Index was a very specific Congregation devoted only to examine books that could offend the faith. Sometimes a book was proscribed by the Holy Office, and notice was given to the Congregation of the Index so that it would be included in the Index of Forbidden Books. This was the case, for instance, with Galileo's *Dialogue*. Instead, Copernicus' *De Revolutionibus* was not the subject of a formal decree of the Holy Office; although the initiative came from the Holy Office, the book was included in the Index only after a discussion of the Cardinals of the Congregation of the Index, in which the qualification given by the experts of the Holy Office was relaxed (the book was not qualified as heretic, but only as contrary to the Scriptures.) The Congregations of the Holy Office and the Index coexisted during several centuries, until the Pope decreed in 1917 that thereafter the tasks of the Congregation of the Index would be carried out by the Holy Office. In recent times the Holy Office was transformed into the Congregation for the Doctrine of the Faith. The Archives of this Congregation, located in the Palace of the Holy Office, very close to St Peter, contain the Archives of both Congregations: the Holy Office and the Index. [\(21\)](#)

G3 is a denunciation of a book, *The Assayer*, therefore it is natural to find it in the Archives of the Index. The new document is a report on G3: obviously G3 was written and presented by someone foreign to the Vatican, and a report had to be made on it by someone working for the Vatican. This is the new document, which I baptized EE 291, after the sheet 291 which it occupies in volume EE. I will concentrate now on this document. [\(22\)](#) [\(23\)](#)

Shortly afterwards I had invited in my University professor William Shea, a veteran among the Galileo scholars. I communicated my discovery to him. He was very excited. We made plans to study the document, trying to determine its author, date, and meaning. After a while, we invited professor Rafael Martínez, from the Pontifical University of the Holy Cross in Rome, to join the team. He has done a very nice work deciphering, translating and commenting the text. Most important, his extensive research has enabled us to determine that the author of the new document is Melchior Inchofer.

I will comment briefly on the content of EE 291. It begins with the words, "I have read the discourse of the Lyncean," a clear reference to Galileo, who was admitted to the Academy of the Lynxes in 1611, and used to unite *Lyncean* to his name on the frontispiece of his books. [\(24\)](#) This was the case for *The Assayer*, the book considered in G3. The fact that EE 291 comes just before G3 leaves no doubt that EE 291 is about *The Assayer*, and more precisely about the presumed incompatibility of Galileo's interpretation of physical qualities with the doctrine of the Eucharist.

In fact, EE 291 examines Galileo's theory of physical qualities as it is presented on pages 346-352 of *The Assayer*. It consists of an introductory paragraph, eight numbered sections, and a conclusion. It is a doctrinal report written by someone who knows the

accusation contained in G3. Apparently G3 was written by someone who was acquainted with the Congregation but did not belong to it; it is a very formal document. Instead, EE 291 is more colloquial, written with less care, and has some handwritten corrections. This would seem to indicate that the author worked for the Congregation, and was asked to write an internal report on whether to proceed with the accusation of G3. EE 291 is critical of Galileo's ideas, and concludes that there is ground to proceed in the Holy Office.

Now I will refer to the author of the new document. He was well known, because he intervened as a consultant in the trial of Galileo in 1633. After the *Dialogue* was published in 1632, Galileo sent copies all over Italy and abroad. He sent eight copies to Rome, destined to qualified people, among them cardinal Francesco Barberini, the nephew and right hand of Pope Urban VIII. Apparently nothing strange happened until mid Summer, when news begun to arrive from Rome to Florence that the Pope was angry with the book and its author. Finally Galileo was summoned to Rome, where he arrived in February 1633. The *Dialogue* was given to three consultants in order to determine whether Galileo defended the heliocentric system. Each one of them wrote a report, and all three agreed that Galileo defended heliocentrism. A very long report was written by one of them, the Jesuit Melchior Inchofer (who published, shortly after the condemnation of Galileo, the *Tractatus Syllepticus*, a booklet against the motion of the Earth). [\(25\)](#)

Although his family was Austrian (his father was an official of the Imperial Army), Melchior Inchofer was born in Hungary, approximately in 1585. In 1605 he arrived to Rome to study in the German-Hungarian College. [\(26\)](#) On March 26, 1607, he was admitted in the novitiate of the Jesuits in Rome. Thereafter he lived in Italy except for a brief period. In 1617 he was sent to Messina, in Sicily, as professor of mathematics, philosophy and theology. He was a prolific writer, inclined towards polemics. By request of the Senate of the city of Messina, Inchofer published in 1629 a writing entitled *A Vindication of the letter of the Blessed Virgin Mary to the people of Messina*, arguing in favor of a local tradition that had been declared non authentic by the Holy Office. Inchofer's writing provoked a strong polemic. Inchofer was accused before the Congregation of the Index, and went to Rome in order to defend himself. In 1630 he was already in Rome. He defended his case very successfully, accepted the suggestions he received, and obtained permission to publish a second corrected edition of his book. Since then he remained in Rome (except for a brief interval in Sicily, between 1634 and 1636 approximately), and had numerous collaborations with the Congregation of the Index.

Rafael Martínez has established Inchofer's authorship of EE 291 beyond any reasonable doubt, comparing carefully EE 291 with a number of other documents written by Inchoffer. This is most important in order to determine the date of the document. We can set an inferior limit: EE 291 could not have been written before 1629. This is very important. It completely changes the context in which EE 291 could have been produced and used.

One would tend to place EE 291 around 1624, when *The Assayer* was published and Galileo heard something about the denunciation. G3, containing the denunciation, would have been produced at that time, and the most natural thing is to suppose that EE 291 was written down immediately afterwards. EE 291 concludes that there is ground

for proceeding further in the Holy Office. Then the book would have been passed on to the Holy Office, and the cardinal mentioned by Guiducci in his letter would have asked father Guevara a report, which finally was positive. The cardinal should be Francesco Barberini, who traveled in those dates to Paris as Legate of the Pope, as Guiducci says in his letter. Apparently all data are in order. The denunciation (G3) and the report (EE 291) had not further consequences, and were kept in the Congregation of the Index, where they are today.

This account is consistent. Nevertheless, if Inchofer is the author of EE 291, it cannot be true, because in that case Inchofer's report should have been written at least in 1629, six years after the publication of *The Assayer*. By that time the context would have been completely different. *The Assayer* had already passed to history, and Galileo was involved with *The Dialogue*, which would be the cause of his trial. In 1630 Galileo was asking permission for the publication of *The Dialogue*. In 1632 *The Dialogue* was published. In 1633 the trial took place and Galileo was condemned. Therefore, EE 291 could easily be related to the circumstances surrounding *The Dialogue* and the trial.

G3 seems to have been sent to the Congregation shortly after *The Assayer* was published in 1623. A similar criticism of *The Assayer* was included by Father Orazio Grassi in his polemic with Galileo, in a book published in 1626, and it makes no sense to suppose that G3 was written after that date without any reference to the published book where the same argument was treated. [\(27\)](#)

Thus, if we place G3 around 1624-1625, there is a distance of several years, five at least, between G3 and EE 291. This means that G3 was removed from the Archives in order to fight Galileo. If this happened before *The Dialogue* was published in 1632, this would simply mean a new campaign against Galileo. If it happened immediately after *The Dialogue* was published in 1632, this could have been a part of a campaign organized by the enemies of Galileo, after the publication of *The Dialogue*, in order to reinforce their action, convincing the Pope that a legal action should be taken against Galileo. If it happened in 1633, then it could have been a part of the study that took place in order to determine the course of the trial of Galileo; indeed, when Galileo arrived to Rome after several months of delay, he had to wait a couple of months before the trial begun, and on that occasion, answering to the Ambassador of Tuscany who requested that the trial should be celebrated and finished as soon as possible, Pope Urban VIII said that to prepare the trial took time. All this scenarios seem possible. Instead, it seems unlikely that a new exam of *The Assayer* took place after the trial, although this cannot be absolutely excluded.

My personal guess is that EE 291 was elaborated in a crucial point, namely when the alarm sounded after the publication of *The Dialogue*, in the Summer of 1632. The Pope was told that a number of defects were found in the book. It was about that time that the document containing the injunction given to Galileo in 1616 that he should not argue for Copernicanism was found in the files of the Holy Office. This document would provide the main argument for the trial of Galileo. If a document from 1616 was found, this means that an archival search was conducted in order to find something that could be used against Galileo. At that time G3 was in the Archives of the Index. When it was presented around 1624 it had no effects, as we know from the letter of Guiducci to Galileo in 1625. But it was a useful weapon to show that there was ground to proceed against Galileo, the friend of the Pope who had always been able to solve his problems

with the Inquisition. Probably Redondi was partly right. There was an attempt to use G3 against Galileo in the trial. He was not right in claiming that the accusation was much harder than the one based on the motion of the Earth, and that the Pope, out of friendship with Galileo, spared him the harder charge. The letters of the Tuscan Ambassador, a moderate and practical man, show Urban VIII indignant against Galileo, his admired friend, when Urban discovered that, without malice but in a very real sense, Galileo had been playing with his friendship during eight years, trying to use this friendship to publish his Copernican ideas. Urban was also angry due to the way Galileo had presented the Pope's argument. Apparently Galileo's enemies had succeeded in presenting the end of *The Dialogue* as a mockery of the Pope's petty argument. Years later, from his house arrest, Galileo was asking his friend the ambassador of France to reassure Pope Urban that he had never had the intention of mocking him.

In 1633 Urban desired that Galileo be condemned. At the same time, he did not want that the punishment would surpass certain limits. It would have been unnecessary, and Galileo had the sympathy of Cardinal Francesco Barberini, the right hand of the Pope. Moreover, the Tuscan authorities pressed in favor of Galileo, and they obtained that Galileo could receive a very exceptional and benign treatment during the trial. To leave aside the accusation contained in G3 would enter within the logic of Urban VIII, but it seems much more likely that the accusation was not taken into consideration simply because it was too weak. In those decades there was a strong dispute around the issue of physical qualities regarding the Eucharist, but one thing is a philosophical and theological dispute, and a quite different thing is a decision of the ecclesiastical authority and a trial. On the contrary, the motion of the Earth had already been the subject of the 1616 condemnation of the Index, and now Galileo was personally involved in it, as it was easy to show that the publication of *The Dialogue* in 1632 was an explicit disobedience to the injunction of 1616. G3 and EE 291 could have been taken into consideration when Galileo's enemies accused him to the Pope, also when the trial was being prepared, but they were rightly considered too weak to be used for the trial.

The circumstances of G3 and EE 291 remain obscure. EE 291 may have been written in order to undermine Galileo's credibility. The move behind EE 291 was perhaps provoked by people who wanted to avoid a benevolent attitude of the authorities toward Galileo, as had happened in 1616. In any event, the accusation was unsuccessful. A better knowledge of the details could throw new light on some important aspects of the trial of Galileo which remain yet in the shadow.

The new document throws some light on the background of the trial of Galileo. Perhaps new documents may be found that may help to fill the black hole of the months following the publication of *The Dialogue*. Certainly, if they exist, they will not be found in the Archives of the Holy Office and the Index. Now the Italian professor Ugo Baldini is making a systematic research of documents related to science in those Archives. He also found EE 291. We had no contact, and each one of us completely ignored the discovery of the other. We have met several times afterwards, and I am able to say that he has found some eight documents more related to Galileo in the Archives. None of them equals the relevance of EE 291. They refer to very marginal circumstances, except one, which shows us another feature of the trial of Galileo completely unknown before, namely that two other people condemned by the Holy Office accompanied Galileo in the recantation on June 22, 1633 in Rome; one of them

was outside Rome and was brought there for that purpose (although I am not able to confirm the authenticity of this document). Therefore, if other documents exist, they should be found outside the Archives of the Holy Office in Rome. I have been fortunate enough to profit the last opportunities to discover there something interesting regarding Galileo.

Finally, I would like to add that, in my view, the Galileo affair was the unfortunate result of a whole series of coincidences. (28) This is why it admits so many interpretations, according to the key we may highlight. The complexity of the affair includes many events and characters along many years. For instance, it includes Galileo's forceful debates in 1616 in Rome; he desired to prevent the condemnation of Copernicanism, but probably he was instrumental to achieve the opposite result. It also includes Galileo's strategy with Urban VIII, which, in the long run, was a disaster; Galileo appeared as having played with Urban's friendship and benevolence. Many other contingent factors can be pointed out: the untimely death of Prince Cesi when the permission for the publication of *The Dialogue* had to be obtained from the Roman authorities, the disgrace of Monsignor Ciampoli with the Pope just when the echoes of *The Dialogue* begun to arrive to Rome, the very harsh circumstances in which Pope Urban VIII found himself in that moment in time due to the Thirty-Years War, and so on.

The discovery of the new document adds new elements to the complexity of the affair, and reinforces the impression that the clash between Galileo and the Roman authorities was not the necessary outcome of an unavoidable clash between science and religion. The Roman authorities did not desire to condemn Galileo at any price. They could have used the charge of G3, as suggested by the author of EE 291, but they did not use it. The Galileo affair is quite complex. G3 and EE 291 open new perspectives in this line. (29) (30)

Index of slides 📌

1. [Splash screen](#)
2. [The archives of the Congregation for the Doctrine of the Faith](#)
3. [Palace of the Holy Office](#)
4. [William R. Shea and Mariano Artigas](#)
5. [Rafael Martínez at M.I.T. \(Cambridge, Ma.\)](#)
6. [Publications on EE 291 \(English and Spanish\)](#)
7. [Publications on EE 291 \(Italian\)](#)
8. [Dava Sobel, Galileo's Daughter \(New York: Walker, 1999\), pp. 231-232](#)
9. [Galileo's telescopic discoveries in 1609-1610](#)
10. [In 1610 Galileo published his astronomical discoveries in the Sidereus Nuncius \(The Messenger of the Stars\), a best seller](#)
11. [Aristotle, Ptolomaeus, and Copernicus, represented in the front cover of Galileo's Dialogue](#)
12. [The 1616 injunction: following orders of Pope Paul V, Cardinal Robert Bellarmine admonished Galileo to abandon Copernicanism](#)
13. [Galileo to Nicolò Fabri di Peiresc, 21 February 1635](#)
14. [In 1623 Galileo published in Rome The Assayer \(Il Saggiatore\), a reply to Grassi, dedicated to the new Pope Urban VIII](#)
15. [Galileo and the book of nature](#)

16. [Galileo explained away the objectivity of sensible qualities \(like color, smell, and so on\).](#)
17. [Pope Urban VIII \(Cardinal Maffeo Barberini\)](#)
18. [Prince Federico Cesi, founder of the Academy of the Lynxes, great friend of Galileo](#)
19. [11 June 1982: Pietro Redondi finds document G3 in the archives of the Congregation for the Doctrine of the Faith \(left, first page of G3\)](#)
20. [New Italian edition \(2004\) of Redondi's Galileo Heretic \(original Italian 1983\)](#)
21. [The Holy Office and the Index](#)
22. [EE 291, discovered by Mariano Artigas in the Archives of the Congregation for the Doctrine of the Faith, in December 1999, first page](#)
23. [EE 291, second page](#)
24. [Galileo named himself "Linceo" \(Lynx, belonging to the Academy of the Lynxes\) in the front cover of The Assayer \(1\) and the Dialogue \(2\)](#)
25. [Tractatus Syllepticus by the Jesuit Melchior Inchofer, against the motion of the Earth, published in Rome shortly after Galileo's condemnation](#)
26. [Inchofer studied in the German-Hungarian College in Rome, now Palazzo di Sant' Apollinare](#)
27. [The Jesuit Orazio Grassi \(under the pen name Lothario Sarsi\) published in 1626 a book where he criticized Galileo's philosophy on sensible qualities as contrary to the Church's doctrine on the Eucharist](#)
28. [The complexity of the Galileo Affair](#)
29. [The role of EE 291 in the Galileo Affair](#)
30. [The meaning of EE 291](#)

Full presentation

Note: Flash animation bigger than 1,5 Mb.
To pass the slides, clic on the image.

The Galileo affair (Italian: il processo a Galileo Galilei) began around 1610 and culminated with the trial and condemnation of Galileo Galilei by the Roman Catholic Inquisition in 1633. Galileo was prosecuted for his support of heliocentrism, the astronomical model in which the Earth and planets revolve around the Sun at the centre of the Solar System. In 1610, Galileo published his *Sidereus Nuncius* (Starry Messenger), describing the surprising observations that he had made with the new telescope. The "Galileo Affair" has been the locus of various and opposing appraisals for centuries: some view it as an historical event emblematic of the obscurantism of the Catholic Church, opposed a priori to the progress of science; others consider it a tragic reciprocal misunderstanding between Galileo, an arrogant and troublesome defender of the Copernican theory, and his theologian adversaries, who were prisoners of. Fantoli traces the growth in Galileo Galilei's thought and actions as he embraced the new worldview presented in *On the Revolutions of the Heavenly Spheres*, the epoch-making work of the great Polish astronomer Nicolaus Copernicus. We have been suggesting that a richer understanding of the Galileo affair can be gained if we refrain from squeezing it into a preconceived mould. It is also instructive to see how the story has been used in subsequent historical contexts. What light does this shed on the trial itself? Biagioli suggests that the rise and fall of Galileo conforms to a well documented pattern in the courtly life of the period: the rise and fall of a favourite, whose fall, once triggered, becomes absolute, swift and inexorable. [37] A characteristic of many such falls was the pretext spelled out by the patron: he had been betrayed. [5] Reston, Galileo: A Life, New York 1994, 285. It would be extremely difficult to delete Urban's involvement. 2005. "New Light on the Galileo Affair?" In. McMullin 2005, 213-33. Beretta, Francesco. 2005a. "The Documents of Galileo's Trial: Recent Hypothesis and Historical Criticism." In McMullin 2005, 191-212. Beretta, Francesco. 2005b. "Galileo, Urban VIII, and the Prosecution of Natural Philosophers." In. McMullin 2005, 234-61. 2003. Galileo: For Copernicanism and for the Church. *Studi Galileiani*, 6. Finocchiaro, Maurice, ed. 1998. *The Galileo Affair: A Documentary History*. University of California Press. Finocchiaro, Maurice. The Galileo affair is the one stock argument used to show that science and Catholic dogma are antagonistic. While Galileo's eventual condemnation was... Contrary to reports in *The New York Times* and other conduits of misinformation about the Church, the Holy See was not on this occasion finally throwing in the towel and admitting that the earth revolves around the sun. Since the Galileo case is one of the historical bludgeons that are used to beat on the Church – the other two being the Crusades and the Spanish Inquisition – it is important that Catholics understand exactly what happened between the Church and that very great scientist. A close look at the facts puts to rout almost every aspect of the reigning Galileo legend.