The restoration of Leonardo da Vinci's *Adoration of the Magi*
Rediscovering a masterpiece

edited by Marco Ciatti and Cecilia Frosinini

On cover
Leonardo da Vinci, *Adoration of the Magi*, 1480–1481, 244 x 240 cm, Florence, Gallerie degli Uffizi, Galleria delle Statue e delle Pitture, inv. 1890 n. 1594, detail after restoration

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Contents

Architecture in Leonardo da Vinci's *Adoration of the Magi*: Some observations on morphology, phenomenology and creation of spatial hierarchy

Emanuela Ferretti

The role of architecture in the composition of Leonardo's *Adoration of the Magi* is certainly not marginal or secondary.[1] The configuration of space, on the one hand, and the interpretation of the larger building, on the other, provide two connotative frameworks.

These components are tightly connected and correlated in Leonardo's painting, as is well known and as also applies to many of his contemporary works of art, and others: in general, in fact, a semiotic approach to the architectural backgrounds in paintings can be an important conceptual tool for advancing understanding of their iconology; conversely, in a deliberate game of mirrors, the characterization of the iconography and iconology of the painting may easily accompany the identification of the *type* of architecture and its semantic function.[2] At the same time identifying the features of the building reveals aspects of the artist's knowledge of architecture.[3] Furthermore, those cases should not be neglected in which the architectural scenery assumes an independent significance to the point of being able to transmit aesthetic, rhetorical or intrinsically evocative qualities, that in turn establish concepts, meanings and complex themes that are not always easy to comprehend.[4] Although following a long tradition, it was during the fifteenth century that architectural scenery assumes a special role (only partly defined), tied to the contemporary architectural culture, and, especially using the tools of perspective, it becomes a vivid means of representing reality and rationalizing space.[5] The architecture not only serves as a way to organize how the composition is perceived, but also to enhance it and render certain allusive and symbolic features of the structures represented: the values they contain take form at the moment they are realized *all'antica*, or recall religious buildings especially significant for Christian or Jewish traditions: "with rigorous perspective, the rational use of light, and meticulous representation, these images in any case

proclaim to patrons, professionals and intelligent connoisseurs, the scientific basis of all figurative arts."[6]

Space, by now, had assumed theatrical tones in the chronological and cultural context in which Leonardo operates, thanks to the codifying and the increasingly informed use of perspective.[7] In Florence, during Lorenzo de' Medici's rule, Leon Battista Alberti's words in the *Della pittura* must have had quite a familiar echo to the art milieu: "If I am not mistaken, the architect took from the painter architraves, capitals, bases, columns and pediments, and all other fine features of buildings. The stonemason, the sculptor and all the workshops and crafts of artificers are guided by the rule and the art of the painter."[8]

Alberti offers us a specific point of theoretical solidification in the artistic context of central Italy as well as elsewhere; his texts form the basis for a constant and defined reflection on the relationship between principles of perspective and the realistic rendering of objects. Architectural backgrounds are shaped according to a Classicizing language that involved not only painting and sculpture but also other media engaging sophisticated craftsmanship, such as goldsmithing, intarsia work and textile manufacture.[9]

This is therefore the context from which the matrix of the architecture in the *Adoration* derives, with its memorably incisive quality: the decoding of its role in the configuration of the scene is very controversial, as is the definition of the general iconography of the painting, whose interpretation is far from unanimously accepted.[10] This all makes it difficult to completely clarify the nature and function of the overall background, and in particular, the *interpretation* of the building that dominates the left side of the *Adoration* (**pl. II**). The previous studies on this, in fact, have gathered various more or less convincing ideas: among these, everything concerning a supposed reference to the base and double ramps (perpendicular to it) of the Medici Villa at Poggio a Caiano, which however was not yet built at the time of the painting,

1. Medici Villa at Poggio a Caiano (from 1489–1490), View of the *basis villae*, 1969 (Florence, Soprintendenza Archeologia, Belle Arti e Paesaggio, Archivio fotografico, n. 48610)

2. Medici Villa at Poggio a Caiano (from 1489–1490), View of the *basis villae*, 1969 (Florence, Soprintendenza Archeologia, Belle Arti e Paesaggio, Archivio fotografico, n. 48602)

since work on it began between 1489 and 1490 (**figs. 1–2**).[11] It therefore seems more accurate to suppose the existence of a common source (for the system of double ramps and the substructure of arches resting on pilasters), seeking the source for both Leonardo and Giuliano da Sangallo among others in classical or late antique architecture.[12] Among these, the first model to mention is the substructure of the Temple of Claudius in Rome, with its stairways—as pointed out many years ago by Howard Burns precisely in relation to the *Adoration*—evidence which Francesco di Giorgio has given us in his drawing (**fig. 3**).[13]

Meanwhile, the hypothesis of a relationship between the stairs in Leonardo's painting and those in the presbytery of San Miniato al Monte[14] does not seem convincing or exclusive, since this type of plan is also found in other Romanesque churches (among them, still existent in the area around Florence, San Romolo in Fiesole), unless closer ties emerge with Leonardo's painting, its history and content.[15] It also is still not possible to resolve the question of whether there is a connection between Leonardo's design and that of the presbytery of San Donato a Scopeto, the church for which the panel was commissioned, as it was destroyed during the preparations for the defense of the city during the siege of 1529–1530.[16]

Considering this degree of uncertainty, it is perhaps useful to take a closer look at the details of the architectural components in the *Adoration*, following a basically descriptive approach, that is a hermeneutic

method that will lead to perceiving the system of signs—which is that of the *language* of architectural construction—bearing well-defined information that can be read and recorded. It is important to underline that the painting's recent restoration has brought to light, or increased the legibility of many details that were hard to see before, in addition to information derived from the analysis and imaging carried out during conservation research by the Opificio delle Pietre Dure: new and meaningful elements are thus available for examination, let us say, as a sort of autoptic view of the architectural background, aiding the elucidation of the single components, and therefore of the whole.[17]

The development of one or more interpretations may then follow this phase of descriptive analysis, and thus shine new light on the *sense* and on the role of the architecture within the conceptual and figurative composition of the entire work that belongs to an important time in Leonardo's life just before his departure for Milan. As is known, a precise list of the artist's knowledge in the fields of architecture and engineering is found in his famous letter to Ludovico il Moro (ca. 1482).[18] Although these skills might still have been only prospective at that date, they are perfectly in line with the broad range of knowledge that it is plausible he acquired when training in Verrocchio's workshop, as well as through attending the many-faceted Laurentian environment.[19] A significant echo of this form of knowledge may also be identified in
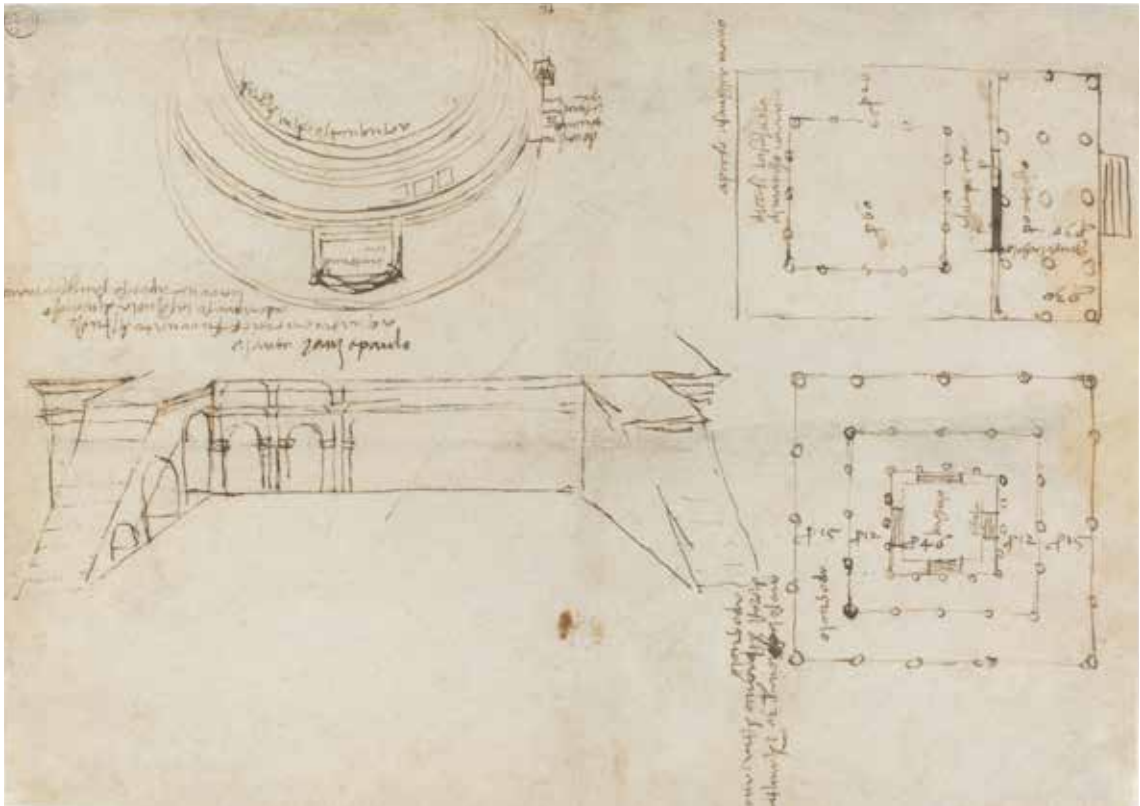
3. Francesco di Giorgio Martini, *View of the substructure of the Temple of Claudius in Rome*, Galleria degli Uffizi, Gabinetto Disegni e delle Stampe, inv. 327 Ar, detail

the complex *architectura ficta* in the *Adoration*, also for this reason worthy of special attention.

The imposing structure that dominates the scene (**pl. XXII**) is composed of a series of arches resting on sober pilasters (in fact they have no pedestals, bases, or capitals). This structural and morphological solution denotes a taste for the archaic, where the potent mass of the walls creates an architecture that is without any sophisticated decoration, that should probably be seen as an affinity to the leanings of Medici culture, and with certain specific aspects of Leon Battista Alberti's way of thinking;[20] or, given its abstract simplicity, interpreted as a reference to a still more ancient architecture, that of the Hebrew tradition.[21] The type of stairway seen here is used very frequently from the Middle Ages to represent the temple of Jerusalem—seen, in particular, in Giottesque art—for scenes of the *Presentation of the Virgin in the Temple* (**figs. 4–5**).[22]

The arches of the portico are covered by cross vaults, mostly shown in ruins, as may be seen from the vegetation on top of them. After all, collapsed or crumbling buildings are frequently found in the backgrounds of other paintings representing the *Adoration* during the fifteenth century, and have precise meanings, ranging from the recovery of

specific themes from the *Golden Legend* by Jacopo da Varagine,[23] to "the *leitmotif* of the Christian era rising from the grandiose ruins of pagan civilization."[24] The fragment of a portico marked by the sequence of vaults is similar to a substructure, with a specific load-bearing function:[25] it appears in fact as a base sustaining the floor above it, reached by climbing a double ramp of stairs (with sixteen steps), perpendicular to it.[26] Between the two staircases there are three round arches—whose geometry is emphasized by an arc with parts perhaps made of brick (**fig. 6**)—once again set on simple pilasters, rising from a sort of artificial plane that indicates a further division of the levels of the ground: in fact the artist establishes this base level as raised by two steps on which the group of figures are placed; they are shown conversing with gestures at the moment when they notice the noble procession coming toward them from behind.

The stairs that reach the floor above are sustained by the massive loggia and interrupt a low parapet; and corresponding to this element, an imposing column may be seen (that seems to rise from the same ground level as that of the portico). This column has an interesting capital (**fig. 7**): the presence of a convex abacus assigns the column to the Corinthian

4. Giotto di Bondone, *Presentation of the Virgin*, Padua, Scrovegni Chapel

5. Taddeo Gaddi, *Presentation of the Virgin*, Florence Basilica di Santa Croce, Baroncelli Chapel

order, however its "cup" lacks the usual stalks and acanthus leaves. Instead, scantily sketched stylized palm leaves may be seen, recalling the south-eastern Mediterranean and Asia Minor, and in particular the temple of Jerusalem.[27]

Another bare version of the Corinthian capital is represented by Francesco di Giorgio in the section of his *Trattato* in which he illustrates the birth of this order. Furthermore, in Martini's codex in the Laurentian Library the drawing is on a page with an annotation by Leonardo, who had a copy of the Sienese artist's

treatise in his library (**fig. 8**).[28] The Corinthian column with an undecorated vase is repeated later in Florence in an important way during the second half of the fifteenth and the early sixteenth century, as may be seen in the pilasters in the intrados of the large openings in the facade of Palazzo Pitti and in the columns in the vestibule of Michelangelo's Laurentian Library.[29]

Reflectography has revealed the presence of another column of the same height and form (parallel to the first), placed toward the center of the painting

6–7. *Adoration of the Magi*, details of the stairs and the Corinthian capital
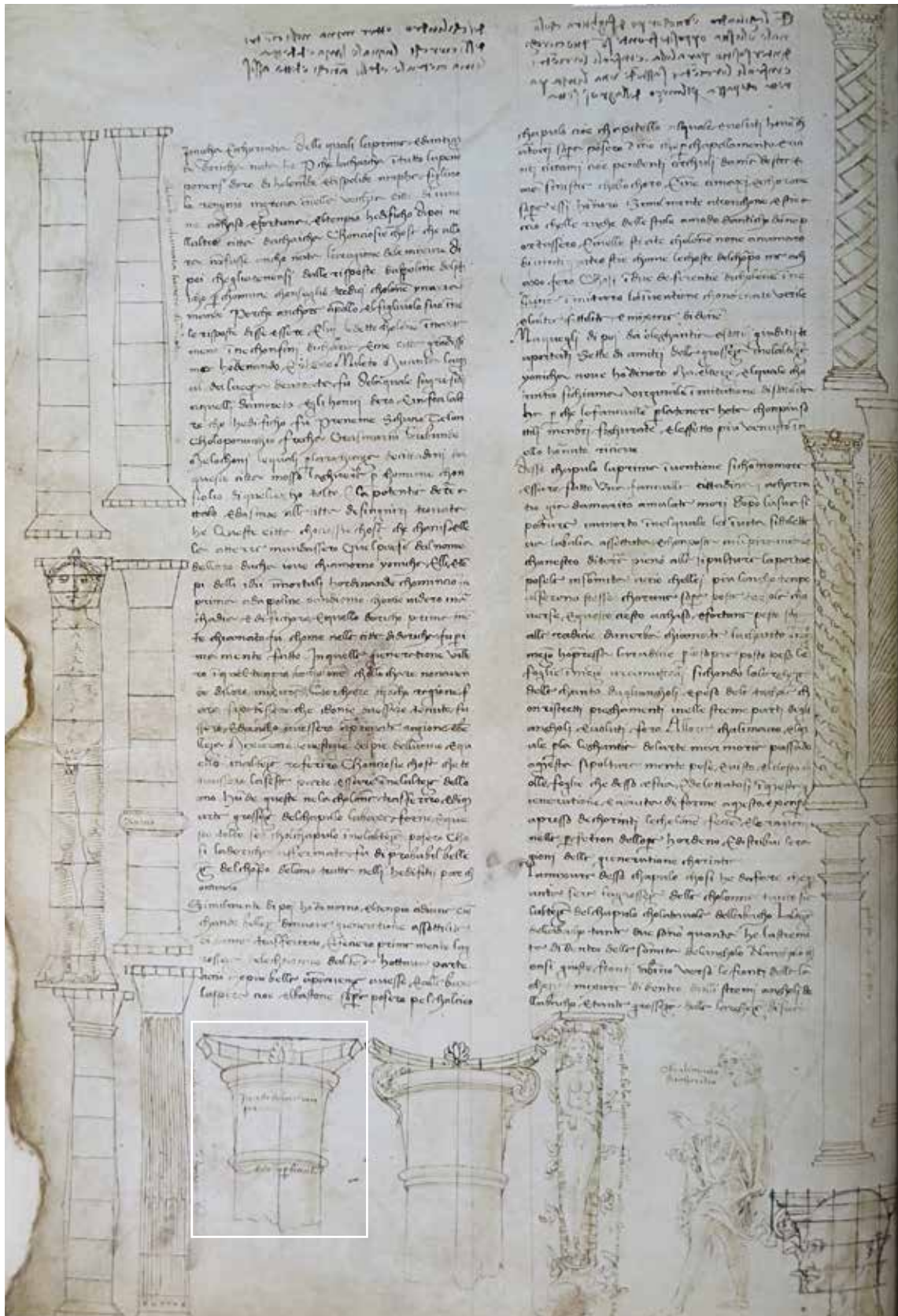
8. Francesco di Giorgio Martini, *Trattato*, Florence, Biblioteca Medicea Laurenziana, MS Ashburnham 361, fol. 13v
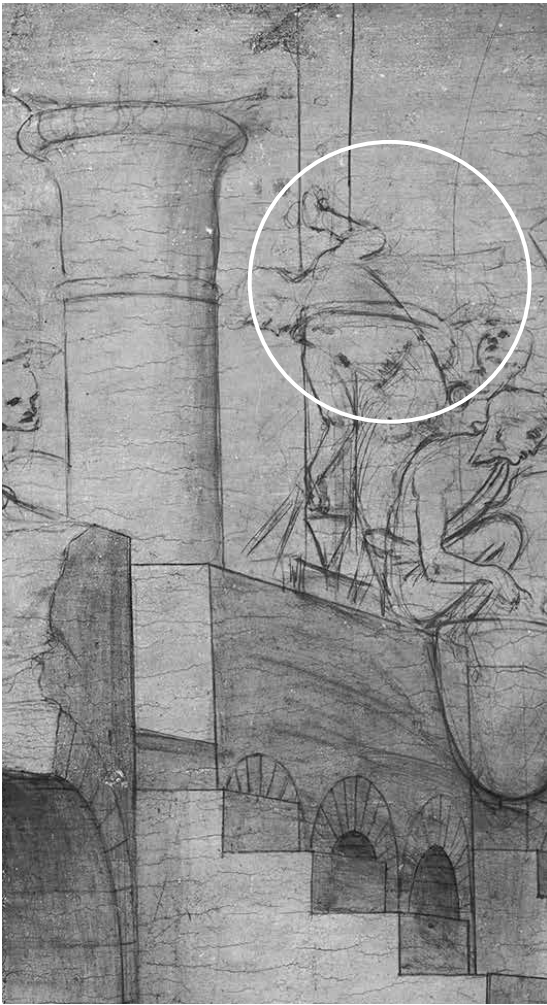
9–10. *Adoration of the Magi*, infrared reflectography, details

(**fig. 9**). On the opposite side, ideally in continuation of the plane of the portico, there is a fragment of a column, whose extremely simplified base has been outlined with essential lines simply marked using a straight edge. Immediately behind it, Leonardo also draws a column in perspective, lying on the ground, and marks the circular section of the shaft, a detail previously invisible before restoration (**figs. 10–11**): this is a very interesting element, as we shall see.

The right part of the painting is occupied by a foreshortened view of the roof of a shed, the one where the Holy Family took shelter: the poverty of its materials and construction is evoked by the shape of the upright, simply a roughed tree trunk with the characteristic forked top, whose form is functional for holding the end of the beam (**fig. 10**).

The two structures, the magnificent building and the humble shed—a factual and conceptual duality that embodies an important contrast[30]—are placed on either side of the fulcrum of the scene, the figures of the Virgin and Child. They are seated on a rocky throne, inserted in a sort of highly naturalistic stone exedra, where a crowd of figures form a semicircle around the Virgin and Jesus: this rocky niche, together with the water toward which Mary extends her foot,[31] reflect a natural dimension that will inevitably underscore the dichotomy of the relationship to the abstract magnificence of the architecture in the left part of the painting, expressing a sensitivity for the landscape that was to exert its influence on other artists, such as Filippino Lippi.[32]

The solemn gravitas of Mary may also be contrasted with the dynamism that animates the figures seen against the architecture of the grand edifice: a minute but vivid scene of men at work on this construction takes life before the observer (**fig. 12**) and offers a counterpoint to the nobility of the parading horsemen passing below the loggia. A specific sensitivity towards the kaleidoscopic universe of worksites is manifested in Leonardo's
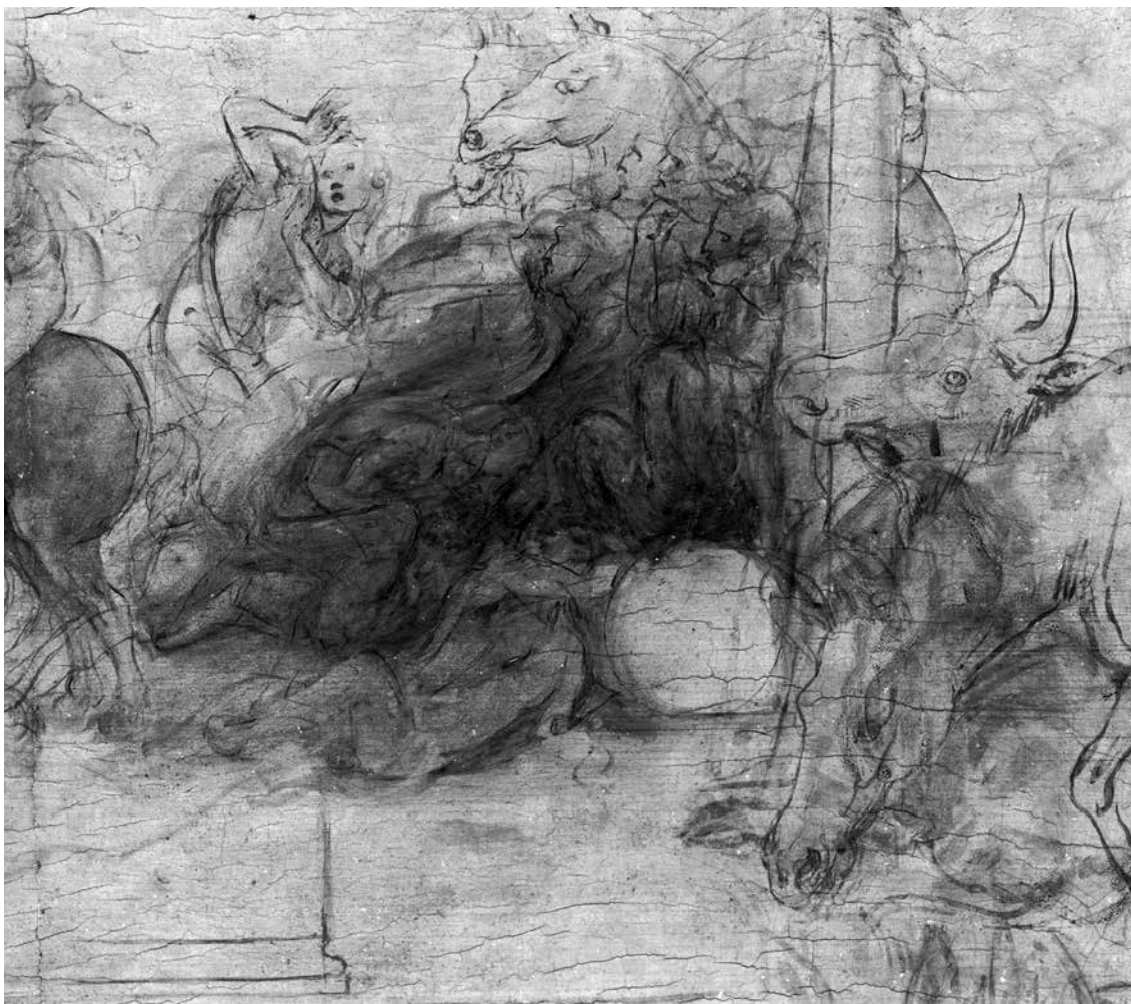
11. *Adoration of the Magi*, infrared reflectography, detail

graphic oeuvre, as may be seen in several drawings where the great expressivity of the everyday gestures and poses of laborers, stonemasons and bricklayers is so evident (**figs. 13–15**).[33] Filippo Lapaccini, Lorenzo the Magnificent's protégée, wrote verses that celebrate the frenzy of work on Palazzo Pitti then under construction, testifying to the central place these themes occupied in Florence during the second half of the fifteenth century, and the strong interest in the lesson, above all theoretical, imparted by Alberti,[34] establishing a direct relationship between the monumental building and Roman antiquities.[35] The perfectly organized and synchronized operations at the worksite was to be celebrated by Piero di Cosimo in his Sarasota panel, a painting that has precise parallels with Leonardo's *Adoration* (fig. 19, p. 44).[36]

Leaving to my other essay in this volume a hypothesis about the role of the features mentioned above in the iconology of the painting, it seems opportune to now examine the two very well-known drawings, now in the Louvre and the Uffizi, that Leonardo devised as preparatory for the *Adoration*.

As underlined more than once, the architecture in the two drawings has an equally important function, with differences that imply many diverse and complementary reference points.

In the drawing in the Louvre (Département des Arts graphiques, R.F. 1978r, **fig. 16**)[37] the portico with its arches on pilasters is placed on the right hand side, while it is shown reversed in the painting, and is sketched rapidly and skillfully. It forms the base for a structure in ruins, as it was to be in the final version. In front of the three central archways, that open as they do in the panel, there are two symmetrical ramps; between them a block is found that may be interpreted as a sacrificial altar, thus alluding to a temple. Figures, including one on horseback and some holding lances, crowd around this altar. If this is indeed an altar, its absence in the painting is something to take seriously

12. *Adoration of the Magi*, detail

13. Leonardo da Vinci, *Drawing of a stonemason at work*, Bayonne, Musée Bonnat, Collection Arts graphiques, NI 1778

into consideration, since it might indicate a variation of the meaning of the architecture in the final version.[38] Pieces of wall lie everywhere around this main nucleus, thus emphasizing the fact that what we see are ruins.

In the drawing, a portion of the building on the left is in the same abandoned condition, as demonstrated by the crest of the broken wall above the entablature, together with the abundant vegetation below. This building, drawn as an integral part of the shed—a humble construction, as the poverty of the wooden structure would suggest—becomes the element that dominates the scene. This communicates ideally with the sumptuous architecture in the part on the right, and speaks with an equally forceful classicist language. The humble shed of the Nativity, incorporating a vertical strut analogous to that in the painting (a tree trunk with a forked end) (**fig. 10**), seems to lean on a ruined structure with a fine antiquarian front. This can be recognized as an original reinterpretation of a motif already developed by Sandro Botticelli, who inserted the Holy Family's shelter inside and connected to ruined buildings, in an explicitly proto-archeological sense.[39]

Leonardo represents the monument in the foreground with a sequence of arches framed by

pilasters that sustain a slender entablature, one of the most complex constructs of architectural classicism,[40] further enriched by the presence of a corner pilaster, with another fragment of a similar arch springing from it. This suggests that Leonardo had in mind an original building with a series of archways also along the front. The surface of this architectural component determined by the arch and its diameter shows some marks that starting from the center fan outwards, perhaps indicating the volutes of a seashell, probably meant to decorate a blind arch or a rather shallow niche. This type of decoration is markedly antiquarian (and also early Christian), particularly appreciated at the time in artistic production as it was in architecture, starting from the pendentives of the scarsella in the Old Sacristy in San Lorenzo in Florence. Choosing this theme to define the semi-destroyed building, markedly proto-archeological and of Albertian derivation, progressively diffused in the Florence of Lorenzo il Magnifico,[41] and became almost a manifesto of a precise stylistic choice, interrupting the line from Brunelleschi to his closest followers (first and foremost Michelozzo and Antonio Manetti Chiaccheri). Verrocchio in particular promoted this architectural layout using it in the early 1470s in the

14. Leonardo da Vinci, *Men at work*, Paris, Bibliothèque de l'Institut de France, MS B, fol. 51v

15. Leonardo da Vinci, *Men at work*, Paris, Bibliothèque de l'Institut de France, MS B. fol. 52r

perspectival background of the *Ruskin Madonna*, now in Edinburgh (**fig. 17**), and then (with the variation of the arch on columns, a combination with the example given by Brunelleschi given the presence of a fragment of an entablature over the capitals) in the tabernacle of Orsanmichele, where the shell motif appears in the canopy of the niche.[42] The composite theme offered by this way of connecting the order fully participates in the erudite Laurentian environment where the lesson of Imperial Rome (together with the knowledge of Vitruvius and Alberti) lead to a specific *all'antica* language, different from that pursued by the followers of Brunelleschi.[43]

The figurative elements forming the architectural background in the Louvre drawing are therefore three: two portions of antique buildings—on the left and right—and the wooden shed in the center. The latter dominates both visually and in hierarchy over the other two (as may be noted, in fact, the portion of the roof on the right covers part of the ramps), that we imagine constructed with precious stone material. All three of these groups, together with the figures that crowd the scene, are situated on a base formed by large steps, perfectly visible in the foreground, that also appear in the painting, although reduced (as in the Uffizi drawing). Many questions arise about how

such a composition so rich in details was meant to take shape, and one may also ask what is the specific message assigned to these structures, so markedly defined.[44] After all, this reveals the artist's multifaceted visual culture, and also indicates a particularly rich conceptual horizon, oriented towards specific expressive choices. A dialogue with the Antique so conscious and offering so many responses was not to recur except occasionally, in Leonardo's reflections on architecture: it is therefore evident that, for me, this absolutely contributes to reinforcing proof of the artist's presence in the Garden of San Marco and his special relation with the Laurentian context.

The spatial organization of the composition in the Uffizi drawing (Florence, Gallerie degli Uffizi, Gabinetto dei Disegni e delle Stampe, inv. 436 E), is more defined, regulated by an exceptionally accurate use of perspective.[45] The architectural features are again divided in three main sections: the monumental building on the left (the one with double ramps and substructures, now moved to the position it was to occupy in the painting, with details even more defined, such as the pilaster bases and the portico/substructure); the antique-style architecture on the right (**fig. 18**) which I do not think represents part
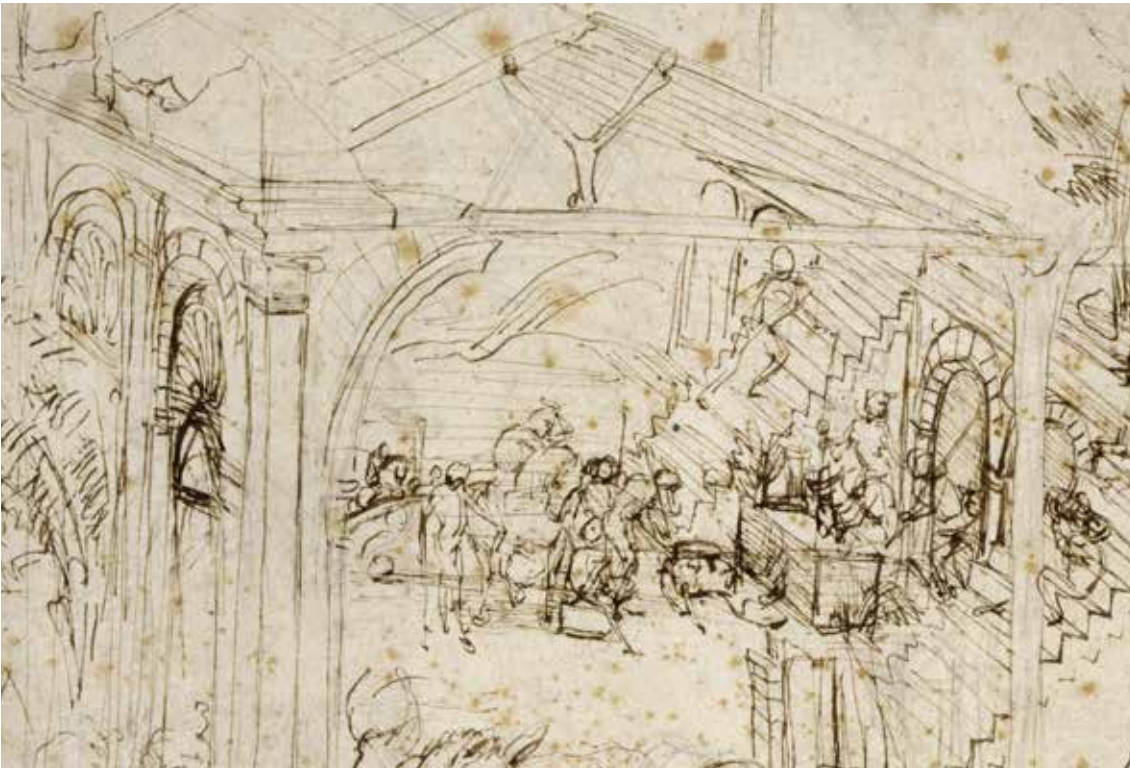
16. Leonardo da Vinci, detail of preparatory drawing for the *Adoration of the Magi*, Paris, Musée du Louvre, Département des Arts graphiques, inv. RF 1978r

of a temple front, as has been proposed,[46] but much more likely evokes an architectural element present in the Forum in Rome (figs. 4–6, p. 155), widely studied by the Florentine artists of the second part of the fifteenth century and indeed beyond.[47]

Lastly, the central portion is dominated by a large structure, suggested by the pitched roof and a few supporting elements (which brings together the architecture on the sides of the sheet).[48]

As for the characteristics of this last construction— it does not seem to be a tent, a reference to the Book of Isaiah as Natali has proposed,[49] unless it may be interpreted as the first sanctuary of Israel (the "tent in the desert"), a complex structure mid-way between the "shelter" and actual architecture, mentioned in the Book of Exodus—what seems to be a sort of crown post flanked by two struts props the uppermost beam of the roof covering, itself placed on a forked post. Another series of supports similar to columns, without bases or capitals, are traced with parallel lines using a straight edge. The sequence of columns is probably part of another building, separate from the larger one on the left, and on which the two very ample coverings are placed. The position of this structure in relation to the other two Classicizing buildings and the columns leaves no doubt about the symbolic relationships to

which the artist wished to give shape and substance.

This is why the building with two parallel ramps of stairs, present in both the drawings and the painting, is what begs the most questions. The question is whether what is found in this construction, so specifically noted together with the large columns), comes from a precise architectural form, or should rather be considered a symbolic or evocative element. Answering this question could contribute to understanding the general scheme of iconography, whose complexity makes it very problematic. It may be said here, in any case, that substantially two answers exist: this structure can be a fragment of the temple of Solomon in Jerusalem, as suggested above all by the form of the capital of the column rising behind the stairs, together with other components in the painting, still to be defined. Or it can be interpreted as the remains of classical architecture, that is, a temple (especially on the basis of what may be seen in the drawing from the Louvre), aligning this monumental ruin with the many architectural representations found in other paintings of this subject in the same period and area.

In conclusion, it may be said that the analysis of the drawings and painting reveal the existence of a non-linear creative process in which the defining of

17. Andrea del Verrocchio, *Madonna and Child* or *Ruskin Madonna*, Edinburgh, Scottish National Gallery, cat. no. 2338

18. Leonardo da Vinci, detail of *Scenario architettonico e rissa di cavalieri* with perspective lines overlaid, Florence, Gallerie degli Uffizi, Gabinetto dei Disegni e delle Stampe, inv. 436 E

the architectural background also plays an integral part. The one element that remains constant from the drawings to the panel, is the grand building with parallel ramps, that however undergoes a progressive and marked simplification that emphasizes its structure and stereometric aspects, almost as if reinforcing the contrast with the vivid expressions of nature and the primeval simplicity of the shed.

1   Among the extensive bibliography, see: C. Pedretti, *Leonardo architetto*, Milan, 1979, pp. 284–86; P. C. Marani, *Leonardo da Vinci: Una carriera di pittore,* Milan, 1999, pp. 113–16; F. Camerota, "Lo studio prospettico," in *Leonardo da Vinci: Studio per l'*Adorazione dei Magi, Rome, 2006, pp. 108–79; M. Kemp, *Leonardo Da Vinci: The Marvellous Works of Nature and Man*, Oxford–New York, 2006 (first ed. London 1981), pp. 47–49.

2   K. Weil-Garris Brandt, "Il rapporto fra scultura e architettura nel Rinascimento," in *Rinascimento da Brunelleschi a Michelangelo: La rappresentazione dell'architettura*, exhibition catalogue (Venice, Palazzo Grassi, 3 March–6 November 1994), edited by H. A. Millon–V. Magnago Lampugnani, Venice, 1994, pp. 75–100; the theme is found in the essays in the volume *Architectura Picta: Nell'arte italiana da Giotto a Veronese*, edited by S. Frommel–G. Wolf, Modena, 2016.

3   M. Ceriana, "Sull'architettura dipinta della pala," in *La pala di San Bernardino di Piero della Francesca: Nuovi studi oltre il restauro*, edited by E. Daffra–F. Trevisani, Florence, 1997, pp. 115–67 in particular, pp. 134–36; M. Ceriana, "Fra Carnevale e la pratica dell'architettura," in *Fra Carnevale: Un artista rinascimentale da Filippo Lippi a Piero della Francesca*, exhibition catalogue (Milan, Pinacoteca di Brera, 13 October 2004–9 January 2005; New York, Metropolitan Museum of Art, 1 February–1 May 2005), edited by M. Ceriana–K. Christiansen, Milan, 2004, pp. 97–136; F. P. Di Teodoro, "Il disegno di architettura, Piero della Francesca e la linea teorica nel *mare magnum* della prassi," in *Piero della Francesca: Il disegno tra arte e scienza*, exhibition catalogue (Reggio Emilia, Palazzo Magnani, 14 March–14 June 2015), edited by F. Camerota–F. P. Di Teodoro–L. Grasselli, Milan, 2015, pp. 53–72.

4   Piero di Cosimo's panel in Sarasota (*The Construction of a Palace*) comes to mind, or the most famous panels of the so-called *Ideal Cities*: see, respectively, Weil-Garris Brandt, *Il rapporto fra scultura e architettura*, pp. 87–96; M. Bulgarelli, "L'architettura nelle tavole prospettiche," in *La città ideale: L'utopia del Rinascimento a Urbino tra Piero della Francesca e Raffaello*, exhibition catalogue (Urbino, Galleria Nazionale delle Marche, 6 April–8 July 2012), edited by A. Marchi–M. R. Valazzi, Milan, 2012, pp. 64–81 with bibliography; for observations on the rhetorical intention of such representations, M. Kemp, "Ideal City with a Circular Temple," in *Circa 1492: Art in the Age of Exploration,* exhibition catalogue (Washington, National Gallery of Art, 12 October 1991–12 January 1992), edited by J. Levenson, New Haven, 1991, p. 250 and after; also, R. Krautheimer, "Le tavole di Urbino, Berlino e Baltimora riesaminate," in *Rinascimento da Brunelleschi a Michelangelo*, pp. 233–59. For an interdisciplinary approach to these themes, concerning the qualities of perspective representation, see F. Cuniberto, *Il vortice estetico*, Perugia, 2015.

5   E. Panofsky, *La prospettiva come forma simbolica*, Milan, 1984 (first Italian edition, 1961), p. 77.

6   Weil-Garris Brandt, *Il rapporto*, p. 97.

7   F. Camerota, *La prospettiva del Rinascimento. Arte, architettura e scienza*, Milan, 2006; F. Camerota, "Le regole del disegno prospettico," in *Piero della Francesca: Il disegno tra arte e scienza*; F. P. Di Teodoro, "Vitruvio, Piero della Francesca, Raffaello: note sulla teoria del disegno di architettura nel Rinascimento," *Annali di architettura*, 14 (2002), pp. 35–54; Di Teodoro, *Il disegno di architettura*; M. Mussini, "Piero della Francesca, la Pittura e la Prospettiva," in L. Grasselli, *Piero della Francesca: De Prospectiva Pingendi: Saggio critico*, Sansepolcro, 2008, pp. 15–137.

8   Leon Battista Alberti, *On Painting*, trans. Cecil Grayson, London, 2004, Book 2, p. 61; D. R. E. Wright, *Il De Pictura di Leon Battista Alberti e i suoi lettori (1435–1600)*, Florence, 2010.

9   M. Haines, *The "Sacrestia delle Messe" of the Florentine Cathedral*, Florence, 1983; G. Cantelli, *Storia dell'oreficeria e dell'arte tessile in Toscana dal Medioevo all'età moderna*, Florence, 1996; A. R. Bloch, "Perspective and Narrative in The Jacob and Esau Panel of Lorenzo Ghiberti's Gates of Paradise," in *A Scarlet Renaissance: Essays in Honor of Sarah Blake McHam*, edited by A. V. Coonin, New York, 2013, pp. 1–34; A. Caporali–E. Ferretti, "L'architettura 'ficta' nelle scene del parato di San Giovanni Battista (1466–1487)," in '*Segni di maraviglia': I ricami su disegno del Pollaiolo per il parato di San Giovanni*, edited by M. Ciatti–S. Conti–R. Filardi–L. Triolo, Florence, 2019, pp. 87–97.

10   See for example the interpretation by Antonio Natali (A. Natali, *Leonardo: Il giardino delle delizie*, Cinisello Balsamo, 2002, pp. 87–101), and that of Frank Zöllner (F. Zöllner, *Leonardo da Vinci 1452–1519: The Complete Paintings and Drawings*, Cologne, 2007); a different one (with which I agree) is that of Martin Kemp (Kemp, *Leonardo Da Vinci*, p. 47), who marks the connection with the sacred texts that recall the collapse of the *Templum Pacis* in Rome related to the birth of Christ (also see note 20).

11   See the essay by A. Belluzzi, *La villa di Poggio a Caiano e l'architettura di Giuliano da Sangallo*, in *Giuliano da Sangallo*, edited by A. Belluzzi–C. Elam–F. P. Fiore, Milan, 2017, pp. 374–86: 374 that defines the chronology of the construction, overcoming—in a very convincing way through renewed reading of the sources— the hypotheses of an early dating of the villa (somewhere between 1480 and 1485). The connection to the stairways of Poggio a Caiano (that is the ramps that existed prior to their substitution with the double ramp stairway in the 19th century, now present) appears first in G. Marchini, "Leonardo e le scale," *Antichità Viva* 24, no. 1–3 (1985): 180–85, taken up again by G. Morolli, "Lorenzo, Leonardo e Giuliano, da San Lorenzo al Duomo al Poggio a Caiano," *Quasar* 3 (1990): 5–14; see also G. Morolli, "Architetture laurenziane," in *Per bellezza, per studio, per piacere: Lorenzo il Magnifico e gli spazi dell'arte*, edited by F. Borsi, Florence, 1991, pp. 195–306: 260; this relationship has been emphasized, among others, in Natali, *Leonardo: Il giardino*, and repeated recently in A. Natali, "La predizione di Isaia: Una trama per l'Adorazione dei Magi di Leonardo," in *Il cosmo magico di Leonardo: L'Adorazione dei Magi restaurata*, exhibition catalogue (Florence, Galleria degli Uffizi, 28 March–24 September 2017), Florence, 2017, pp. 17–33: 22.

12   The presence of a common reference point for Leonardo and Giuliano da Sangallo (for whom the fact that the villa is made after the painting is correctly noted) appears in S. Frommel, "Giuliano da Sangallo and Leonardo da Vinci: Cross-Pollination or Parallels?," in *Illuminating Leonardo: A festschrift for Carlo Pedretti Celebrating his 70 Years of Scholarship (1944–2014)*, edited by C. Moffatt–S. Taglialagamba, Leiden–Boston, 2016, vol. I, pp. 85–99: 85–87: the historian also cites the Temple of Claudius in Rome (drawn by Giuliano da Sangallo and Francesco di Giorgio, as already shown by H. Burns, see here note 13; also see S. Frommel, "Le architetture del Taccuino Senese: La Sapienza di Siena, la villa di Poggio a Caiano, Santa Maria delle Carceri a Prato, disegni per Santo Spirito e S. Lorenzo," in *Giuliano da Sangallo: Disegni degli Uffizi*, exhibition catalogue (Florence, Galleria degli Uffizi, 16 May–20 August 2017), edited by D. Donetti–M. Faietti–S. Frommel, Florence 2017, pp. 31–43: 37), also including San Sebastiano in Mantua, as already proposed by others. However, the present configuration of the church in Mantua is due to restoration in the 1920s: a summary of this appears in V. Ghizzi, "San Sebastiano: La chiesa 'chomenzata per uno insonio,'" in *Leon Battista Alberti e l'architettura*, exhibition catalogue (Mantua, Casa del Mantegna, 16 September–14 January 2007), edited by M. Bulgarelli–A. Calzona–M. Ceriana–F. P. Fiore, Cinisello Balsamo, 2006, pp. 454–463. To understand the project on which the original configuration of the church front at the time of the Gonzaga was based, connections with the Tempietto del Clitumno in Umbria, well known during the Renaissance and drawn, among others, by Francesco di Giorgio, and with the tomb "of the Cercenii" (also depicted in drawings in the 15th and 16th centuries): R. Samperi, cat. nos. 87–88, in *Leon Battista Alberti e l'architettura*, pp. 479–80.

13   H. Burns, cat. no. XX.17, in *Francesco di Giorgio Architetto*, exhibition catalogue (Siena,