that rewrites the whole story (see Whitestone, 'The Identification and Attribution of Christiaan Huygens' First Pendulum Clock'. AH December 2008, pp. 201-222, and Whitestone, 'Christiaan Huygens' Lost and Forgotten Pamphlet of his Pendulum Invention', Annals of Science, January 2012, pp. 91-104). The Coster clocks that Hanet copied were not the first model of Huygens' invention, which was a seconds indicating regulator of decidedly French appearance. This surprising French rather than Dutch origin is echoed in France where the invention is accurately depicted in engravings and on the façade of the Paris Observatory. And these depictions show a regulator known only in the work of Thuret, (I include in that work a movement which is later signed on a replaced dial, 'Langlois à Paris'). It is this Thuret-type model that was first illustrated by Huygens in 1657, up to a year before Hanet's first recorded clock. Only this Thuret model conforms to the description of its inventor. The Hague and religieuse clocks were the later domestic versions of that model, shorn of the ability to measure or indicate the 'secunda scrupula' that Huygens prescribed but that only science required. Hordijk's bibliography exclusively lists studies that either predate this discovery or ignore it and that completely miss this distinction. These studies fail to remark on the total absence of the second in the clocks they propose as the first examples of a design intended to measure it.

Hanet died in 1687 and his son in 1723. Hordijk has managed to find 44 clocks with the signature 'Nicolas Hanet' and he illustrates 28 of them in this book along with many watches. Coster's early work is included for comparison. however the curious feature on his dials, where the lambrequins are beautifully engraved with his signature above a crude etching of 'met privilege' is left unconsidered by Hordijk, as it has been in all previous studies. In my view the only adequate explanation for this juxtaposition of two very different styles of inscription, is that these Coster lambrequins acted, not simply as a convenient place upon which to put the maker's signature, but also as tokens issued by Huygens to show royalties had been paid on each clock sold. Coster would have been obliged to purchase these lambrequins with the 'met privilege' etched in facsimile on them but otherwise left blank for his signature or that of

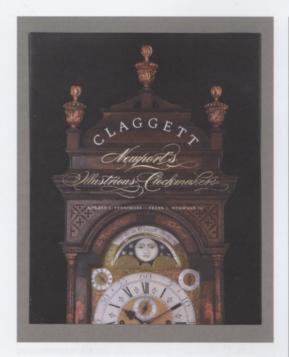
his assignee. Thereafter each clock carried visible proof that it had been accounted for. The relevance of this to French religieuse clocks is that these lambrequins became decoratively fashionable in France and it is possible that Huygens' unusual idea was responsible for this. Both Hanets produced watches although no prebalance spring watches are known. Hanet père may have worked on the early development of the balance spring. Many impressive onion-type watches are signed by Hanet, most with fusee. His son worked closely with Etienne Hubert and Jacques Gouchon.

Full family biographies are given and the addenda contains a copy of Coster's probate document, (Akte van Bewijs), showing that Coster was owed 759 guilders by Hanet at the time of his death in 1659. The PDF copy that I received for review shows many illustrations of high quality with much useful information. It is a large and valuable resource and the evident trouble that the author has taken in making it accessible to English readers is something for which he deserves our gratitude.

Sebastian Whitestone

Claggett: Newport's Illustrious Clockmakers, by Donald L. Fennimore and Frank L. Hohmann III. A Winterthur Book. Winterthur, Del.: Winterthur Museum, Garden & Library and Newport Historical Society, 2018. 268 pages; 321 colour illustrations. Distributed by Yale University Press, New Haven and London. \$65,00.

For decades, scholars and collectors of colonial American clockmaker William Claggett (1696-1749) have referred to the booklet William Claggett and his Clockmaking Family published in 1976 by the National Association of Watch and Clock Collectors (NAWCC). Gathered and written by librarian, historian, and polymath Richard L. Champlin (1906-2003), this 48-page study was the most complete treatise on three Rhode Island clockmakers-William Claggett, James Wady, and Thomas Claggett-whose names and work were recorded (often inaccurately) in prior volumes by Luke Vincent Lockwood, Wallace Nutting, Brooks Palmer, and others. Much more recently, Claggett family clocks were featured in Timeless by Frank L. Hohmann III, and



Musical Clocks of Early America, 1730–1830 by Gary R. Sullivan and Kate Van Winkle Keller.

Now, an even more definitive book is available. Frank Hohmann again teamed with Winterthur curator emeritus Don Fennimore to produce this impressive hardcover. It is bolstered with introductory essays by two well-known experts on early Rhode Island furniture, curators Patricia E. Kane at the Yale University Art Gallery and Dennis Carr at the Museum of Fine Arts, Boston.

Although not intended to be a catalogue raisonné, the book provides an in-depth catalogue of twenty-eight examples selected as the most important of the ninety-eight clocks shown in the larger 'Checklist' of all that could be located. Each clock's text also shows its assigned number in the Rhode Island Furniture Archive created and maintained at Yale. It may not be astonishing that so many of these clocks survive. They are top-quality decorative-arts masterpieces that were prized when new, cherished as they aged, and permanently appreciated as iconic artefacts.

Readers may question the choice of those twenty-eight featured clocks, but the longer checklist offers provenance and ownership references for the others, some of which may be viewed and assessed independently in collections. Of course, and as expected, we hear of more Claggett clocks now emerging since the book's publication, continuing the happy process of discovery reported by the authors.

The book's highlighted selections indicate the authors' emphasis on the clocks' aesthetics, appearance, and wood case attributes rather than on technical aspects of the mechanical movements. Cases are closely described with many details on woods, feet, finials, doors, pediments, sidelights, bases, and even movement seat boards. Commonly believed is that the 'furniture' aspects of clocks contribute most to their appeal and value, so the authors are seeking a broader audience than the relatively small world of clock lovers who focus on movement characteristics, innovations, and complications.

This raises an interesting issue. What is a Claggett or Wady clock? If most attention is paid to the ornate mahogany, walnut, or japanned pine cases built by different craftsmen, why credit the name on the dial? Perhaps just as controversial, what if the movements themselves were made mostly of imported English parts, or entirely English? There is extensive evidence of this for many colonial American clocks including the lauded tall clocks signed by the Willard family of Massachusetts.

The engraved brass dials do appear to be the work of their signers, and are well illustrated and described in the book. These boast skillful numbering, lettering, and elaborate embellishments. The engraving by William Claggett is the most praiseworthy, and was recognized when he was employed to produce local paper currency that deterred counterfeiters.

While Wady and the Claggetts were *makers* of clocks, probably more important was their repair work that would have provided substantial income. Newport certainly had many more timepieces than theirs, all of which needed regular servicing due to dusty, damp, and smoky conditions as well as from accidents and rough handling. Sadly, none of their ledgers has been found, so their repair work is not documented in the book.

There is much else in the book beyond clockmaking and clocks. The eighteenth-century history of Newport, its early growth and boom and then rapid decline during our War of Independence, is well explored as relevant to why the Claggetts settled and worked there.

Newport was a flourishing port for European and Caribbean trade, providing access to imported goods (including clocks and clock components). William was born in England, educated and well-trained there although not listed in the London clockmakers guild, arrived in Boston by 1715, but soon moved to Newport for better financial opportunities and escape from religious strictures.

There is more human-interest material. William worked with his father as a baker, constructed a static-electricity machine which he demonstrated for pay in Boston, and was in court sixty-two times over money disputes. Until new research was uncovered for this book, Thomas Claggett was universally claimed as the son of William. Now it is unclear if Thomas even was a relative, although likely. His output was much smaller, and he died insane and impoverished. James Wady, also a clockmaker from England where he went bankrupt, came to Newport and married William's daughter. Mostly he worked as a journeyman for his father-inlaw, and also died a pauper.

Fortunately for those of us who still appreciate clocks from colonial North America. another Hohmann and Fennimore book is underway. Absent the scholarly and financial commitment that the authors continue to demonstrate, these kinds of reference books never would appear, given today's decreased interest in that era's material culture, and current publishers' disinterest in offering serious printed books on such subjects. The forthcoming book will focus on brothers David and Benjamin Rittenhouse of eighteenthcentury Philadelphia, and promises to shine the same intense beam of scholarly light on two other distinguished American makers of significant clocks and fine scientific instruments.

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