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Willem van de Velde *marine draughtsman*

• MARTIN BIJL •

He could not have signed his letters more fittingly than with the words 'marine draughtsman'.¹ As far as we know, Van de Velde drew nothing but ships and things relating to them until his eighty-second year.² He must have attracted a following quite quickly, for his earliest known works were all executed on the then fashionable and durable vellum.³ Clearly, though, his ambitions went further than the dimensions that vellum allowed, because at a certain point, some time in the mid-1640s, he began, as Houbraken writes, 'to draw on whitened panels'.⁴ This let him increase his scale to a maximum of one and a half metres, but it was still not enough for Willem's expansionist ambitions. As early as 1652 he wrote to the Swedish count Carl Gustaf Wrangel to tell him that he was able to make pieces up to twenty-five feet (more than seven metres).⁵ A covering letter by Michel le Blon goes even further by suggesting thirty feet (eight and a half metres).⁶ At that time Van de Velde had evidently discovered the almost limitless possibilities of canvas. It is highly debatable, however, that he realized what was involved in making a thirty-foot drawing. There is absolutely no indication that he had any experience with working on canvas, let alone in very large sizes.

Detail of fig 1.

His earliest dated works on canvas are from 1657. One of them, the *Battle of Ter Heide*, at 2.86 metres, is one of his largest pieces,⁷ and in 1665 he made his largest, the *Battle of the Sound* (2.95 metres).⁸ As we shall see later, in these pieces he was already at the limits of his capabilities.

Given the enormous number of relatively large pieces that he was undoubtedly commissioned to make, Van de Velde must have had a host of admirers. He probably began as an enthusiast – he was the son of barge master – but he ended up as a court painter. His work was appreciated on artistic, aesthetic, documentary and technical grounds, but in the twentieth century little remained of this artistic regard. His work figured almost exclusively as illustrations of historic events. The fascination with his technique, however, seems less a product of its age. For Leopoldo de' Medici it was actually the most important reason for deciding to purchase a work by Van de Velde, and today's museum visitors may still wonder what they are actually looking at.

Canvases and Panels

As the quotation from Houbraken suggests, the panels that Van de Velde worked on are the same as those used by his contemporaries who painted.

Painters' panels were on sale ready-made in standard sizes in shops that sold artists' supplies. The note on the back of one of Van de Velde's drawings to the effect that the composition had been transferred to a 'guilder panel', one of the standard painting sizes, confirms that he used regular sizes. Marine painters could also buy special sizes, 'seewaterspanelen', but because the seventeenth-century terminology for standard panels cannot be linked to specific dimensions it is not clear whether Van de Velde used them too.

Around 1700 George Vertue, writing in his *Notebooks*, said of Van de Velde that he worked on 'ground prepared on canvas'.⁹ The largest canvases would have to have been specially ordered because they were not available in standard sizes, but that was no reason to depart from the usual materials. Canvas for priming was usually stretched on a larger frame with cords and so could easily be supplied in almost any size required. This made it the ideal substitute for the traditional panels that had limitations in size. Canvas was also cheaper and considerably lighter, and could be rolled up if it had to be transported – particularly useful properties where large sizes were concerned. What's more the ever dwindling supply of oak from the by now plundered primeval forests in the Baltic region finally dried up when the Sound became the scene of Scandinavian disputes around 1650. Oak was obtained from other areas from then on, but this was considered to be of inferior quality and would have been even more expensive because it was scarcer. This was another reason why artists started to use canvas for smaller and smaller paintings. After Van de Velde fled to London in 1672 he worked exclusively on canvas.

Priming

Canvases and panels that an artist purchased were generally ready-primed. Panels were glued before a

ground of chalk and size was applied, in either one or two coats. In many cases the artist himself applied a light coloured imprimatura of oil paint in order to counteract the strongly absorbent effect of the porous chalk layer. After some documented bad experiences with this method of priming on canvas early in the seventeenth century, artists swiftly switched to an oil paint ground, for the most part made up of cheap pigments. This remained flexible so that no problems were encountered when the canvases were rolled up.

Interestingly, Van de Velde's priming on both panel and canvas differed from the norm.¹⁰ Instead of the normal pure white ground used for centuries, Van de Velde's panels reveal a brown undercoat with an off-white layer on top of it. He applied an almost white imprimatura over this. The brown undercoat creates a subtle warm tone that bears some resemblance to vellum and paper. Vertue's remark in his *Notebooks* that Van de Velde 'commonly drew in black and white on a ground prepared on canvas, but which appeared like paper', explains this.¹¹ Knowing this, it is at least remarkable that, as far as we know, when preparing canvases Van de Velde did not use the 'warm' first priming coat popular in Amsterdam with which he had been easily able to achieve a similar effect with his panels.¹² Why we find two virtually white layers here remains a mystery for the time being. It is true there is a warm radiance that results from the addition of a little ochre or umber, but the effect is nevertheless significantly cooler than the ground on panels. It is interesting that both layers, unlike those on normal painters' canvases, contain relatively large amounts of chalk. The upper layer clearly contains more chalk than the one underneath, entirely contrary to all practices. It must have been Van de Velde's drawing technique that necessitated this

adaptation. Jacob Campo Weyerman made the interesting observation that Van de Velde 'drew on white panels, and on canvases primed with flake white'.¹³ Flake white is the best quality (but expensive) lead white, which seventeenth-century artists' manuals only recommend for the finest work such as faces. Indeed Van de Velde's surfaces are noticeably flat compared to paint surfaces in the work of fellow artists who used a lot of lead white. The great disadvantage of using an oil paint as a ground is that it takes at least three months before it is hard enough to draw on with a pen.

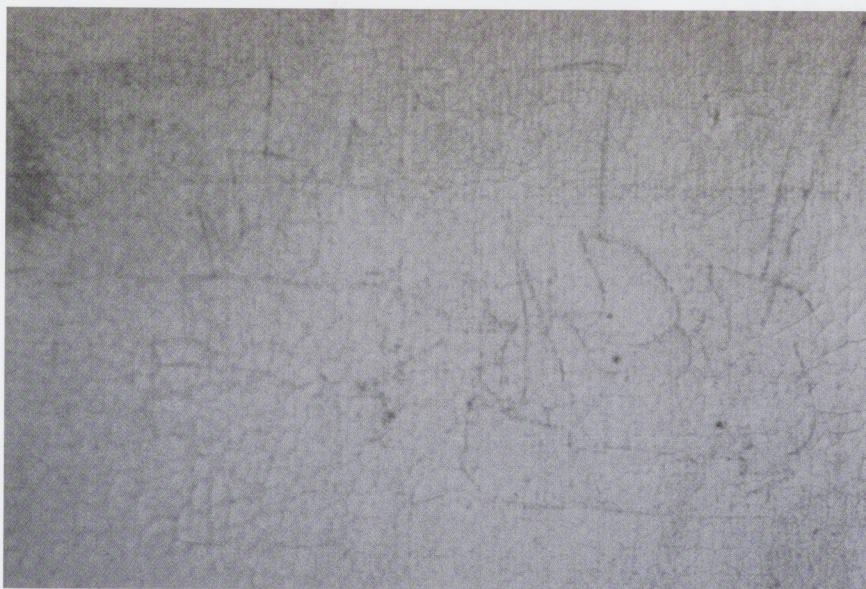
The Underdrawing and Drawing

Figures and ships alike were indicated in simple outlines with something that strongly resembles graphite when seen through the microscope. During the execution Van de Velde often departed quite considerably from his own designs (fig. 1). In a large piece like the *Battle of Ter Heide* some ships close to the horizon were left unresolved (fig. 2). As yet unpublished Rembrandt research has recently revealed that underdrawings were usually preceded



Fig. 1
Finished drawing
differs from
underdrawing.

Fig. 2
Preparatory drawing
was not executed.



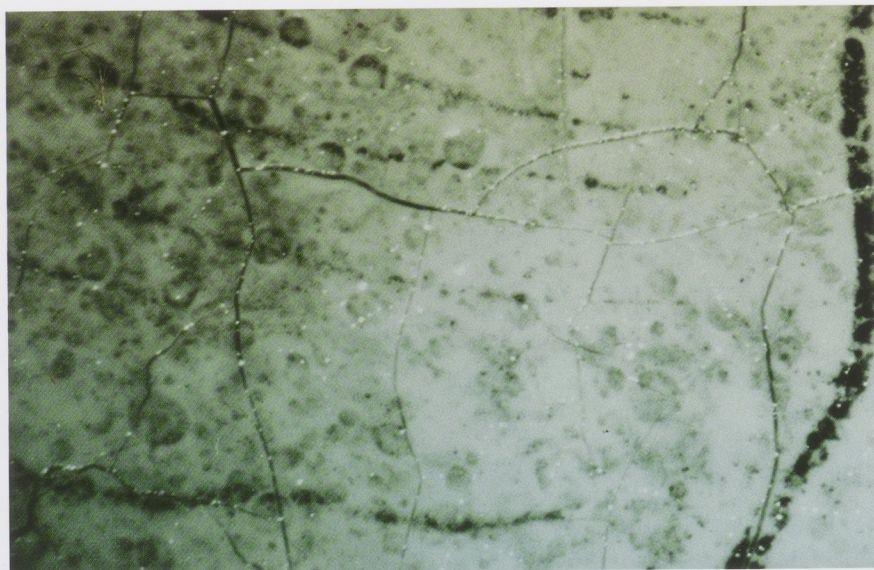


Fig. 3
Air bubbles in
the washes.

by chalk or tempera sketches to establish the definitive composition. These original rough ideas generally disappeared during the process of painting. In view of Van de Velde's quite detailed underdrawing it seems likely that he also made initial designs, but no traces have been found to date. In Van de Velde's early work almost all the shades of light and dark were obtained by subtle hatching, but over time the number of washes increased. In the first place this probably had to do with how labour-intensive hatching was, but then Van de Velde observed that true enthusiasts found the freer washes more natural and consequently more attractive.¹⁴

In a magnified detail of the *Battle of Ter Heide*, the dried bubbles show that the ink used for the washes was made with a water-retaining medium (fig. 3), undoubtedly a variant that Van de Velde thought up himself. This explains the large amount of chalk in the priming, although the dried bubbles prove that the ratio of chalk to oil was not always as good as it might have been.

In normal drawings washes were usually applied at the end, but this was

never the case with Van de Velde's 'pen paintings'. The ink he used was a compelling factor here. Tests on a drawn line that reached to the border at the edge of the *Battle of Ter Heide* and on a similar line in one of Van de Velde's pen drawings on vellum tell us that the medium is animal glue. Animal glues are made up of proteins from tissues of animal remains dissolved in water (rabbit skin size, for example) which are only workable while they are warm. This has considerable implications. The 'ink' has to be kept permanently warm in a bain-marie. When applied, the 'ink' dissolves very readily, particularly in the first few months, which makes it impossible to draw lines first. This means that the order of working – first washes, then lines – is absolutely fixed. The pigment used also calcines, which would indicate that it is lampblack, since as far as we know other types of ink do not do this. De Mayerne, a seventeenth-century doctor who collected artists' recipes, mentions an imitation Chinese lacquer made from lampblack in animal glue. This tells us that it is a stable, warm, black material. Microscopic observations appear to confirm

this as they show relatively thick black lines that once again point to an 'ink' with considerable body, something that the classical inks lack.

The early 'pen paintings' by Van de Velde and his colleagues quite often appear to be imitating prints, and this has given rise to the question as to whether these works really were made with a pen, given that some artists, Experiens Sillemans among them, actually printed parts of etching plates on panels.¹⁵ In Van de Velde's case there is no doubt that a pen was used. In the letter to Wrangel he wrote that he wanted 'to prove what could be done with a pen', and there are other sources in which he likewise mentions his pen.¹⁶

Fig. 4
Reconstruction
of Van de Velde's
technique.



In the existing articles about 'pen paintings' it is generally assumed that a quill pen was used.¹⁷ However experiments have established that a quill is unsuitable for this unusual type of 'ink' and also less suitable for grounds on canvas or panel. Simple reed pens made from the reed that grows alongside the sides of Dutch ditches and could be obtained in abundance on the wharves did meet the requirements: they are fairly strong and can be cut very fine. Unlike the point of a quill, that of a reed pen is not slit. This is why they do not make split lines. We never encounter split lines in Van de Velde's work. To get the best results from a reed pen the surface on which the artist is working has to be sloping. Flat or upright surfaces cause the ink to run out of the pen, so the canvases and panels on which Van de Velde worked must have been placed on a slant. Reconstruction tests have confirmed this. It also proved fairly easy, even for an unpractised hand, to make a reconstruction with variable thick and thin lines. The illustration shows a reconstruction made with a single pen (fig. 4). Using a number of pens with points of different widths and repeatedly diluting the 'ink', it is relatively simple to replicate the entire range of nuances Van de Velde employed to express atmospheric perspective. This knowledge was used during restoration by making retouches with a reed pen and an 'ink' made from a synthetic resin and lampblack while the painting was in a slanting position (fig. 5).¹⁸ Much of what we know came to light through reconstructions during the restoration work on the *Battle of Ter Heide*. The horizon in this painting is approximately 95 cm from the bottom edge. When a surface like that is set at a slant it is physically almost impossible for a restorer – even one who is nearly six foot three tall – to reach that far. Good control of the pen is out of the question. This explains why most of the ships close to the hori-

zon were done predominantly with a brush and why a somewhat larger ship sketched out between the two columns of smoke on the left was never actually completed. Van de Velde had no choice but to execute the skies of large canvases with a brush. In the relatively early work, the *Battle of Ter Heide*, the sky was done in oils. The same lamp-black was used for the oil paint and the 'ink', but because it inevitably has to be mixed with white in this technique, the tonality of the sky is much cooler than the drawn passages. Seventeenth-century artists' manuals advise mixing white and black to obtain certain shades of blue. It is doubtful whether Van de Velde himself was very happy with this because, with probably one exception, he executed the skies in large works with 'ink' washes.

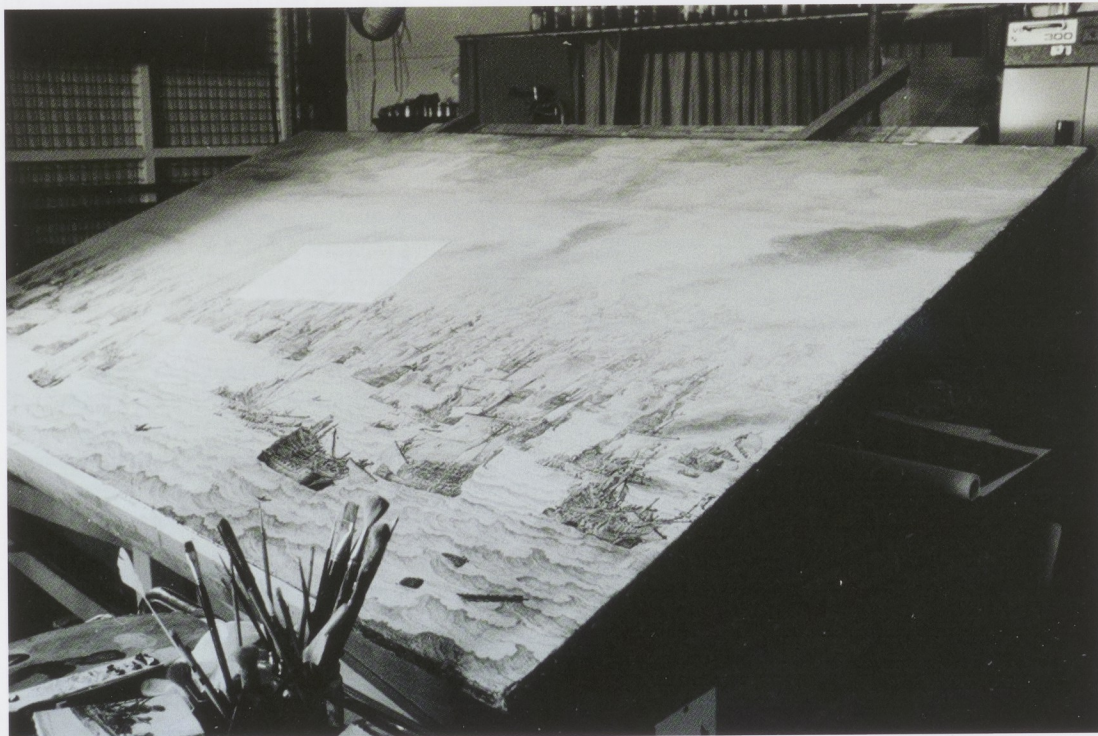
Fig. 5

The painting is positioned like a drawing board to enable retouching.

Varnishes

Normal drawings are not varnished, but are Van de Velde's drawn paintings really drawings? The struggle with the

nomenclature leads us to suspect that they are not. 'Pen painting' is a term that does not entirely cover it, but has proved the most workable in practice. Paintings are indeed varnished and the same is true of Van de Velde's work, judging by the remark in Le Blon's letter: '... his work or drawing ... of exactness and perfection on white canvases or panels which are prepared such that they can be hung in rain and wind, and can be washed with a sponge like oil paintings'.¹⁹ A work can only be 'washed with a sponge' if it is varnished. Le Blon makes a similar comment later which also indicates that Van de Velde's work had to be kept as bright as possible. Yellowed varnishes do indeed destroy the effect of depth, even more than in normal paintings. This is disastrous for an artist who devoted so much attention to atmospheric perspective. The great advantage of the technique that Van de Velde chose is that his works, like paintings, could be hung on the wall



and, unlike paper, did not have to be carefully stored and preserved. This is something Wouter Kloek was well aware of when he reserved an entire room for the imposing ensemble of Van de Velde's pen paintings from the Tromp family collection during the renovation of the main gallery in 1996.

NOTES

- 1 He always added *scheep teickenaer* after his name.
- 2 Except for a few not very successful paintings in oils at the end of his life.
- 3 His earliest dated works bear the dates 1638 and 1639. Recently a group of small works on vellum, which have always been credited to Margareta de Heer, have been convincingly attributed to Van de Velde. These works are dated around 1635 and are predominantly portraits of ships, sometimes several on one sheet of vellum from different viewpoints. Very recently a drawing was sold in London which was drawn on what was assumed to be vellum, but further study revealed was prepared paper. It is probably one of Van de Velde's earliest attempts to produce his drawings on a more stable material than ordinary paper. My thanks to Rob Kattenburg for this information.
- 4 'op gewitte paneelen te teikenen' A. Houbraken, *De groote Schouburch der Nederlandsche Konstschilders en schilderessen*, (ed. P.T.A. Swillens), Maastricht 1943, I, p. 279.
- 5 Letter from Van de Velde to Wrangel, held in the Rijksarchief in Stockholm. Bas Kist and Jan van der Waals provided me with this information.
- 6 Letter by an anonymous writer which accompanied the letter in note 4.
- 7 Rijksmuseum Amsterdam, inv. no. SK-A-1365.
- 8 Palazzo Pitti, Florence, inv. no. 327.
- 9 *The Walpole Society*, 20 (1931-32), p. 142.
- 10 Information from restoration reports in the National Maritime Museum at Greenwich and the Rijksmuseum.
- 11 *The Walpole Society*, 20 (1931-32), p. 142.
- 12 Until now only a small number of grounds on canvas have been examined. It is possible that a different type of priming may yet be found.
- 13 '...tekende op witte Panneelen, en op met schulpwit geplemuurde doeken', Jacob Campo Weyerman, *De levensbeschrijvingen der Konstschilders*, The Hague 1729, p. 100.
- 14 A. Mirto, H. T. Van Veen, *Pieter Blaeu: Lettere ai Fiorentini*, Florence, Amsterdam 1993, p. 285 (letter from Pieter Bleau to Leopoldo de' Medici dated 27 July 1647).
- 15 D. Friedberg, A. Burnstock, A. Phenix, 'Paintings or Prints? Experiens Sillemans and the Origins of the *Grisaille* Sea-piece: Notes on a Rediscovered Technique', *Print Quarterly* 1 (1984), pp. 154-55.
- 16 '...doen blijcken wat men met een penne doen can', see note 5.
- 17 W. Percival-Prescott, 'The Art of the Van de Velde; Techniques and Materials, National Maritime Museum, London 1982, p. 31. Friso Lammertse, 'Wat men met een penne doen can', in cat. Rotterdam, Museum Boymans Van Beuningen, *Lof der zeevaart*, Rotterdam 1996, pp. 45-58.
- 18 Mowilith 20. A synthetic resin that remains soluble and is also a much-used medium for normal retouches.
- 19 '... sijn werck offe teickening ... van Curieusheijt en perfectie op witte doucken offe pannelen, die soo geprepareet sijn dan men se in reegen ende winde can hangen, ende met een een sponsie kan affwaschen, gelijk als olieverwe schilderijen ...'