Richard Hamilton: Art, Technology and a Medal Designed for Dishonour

The Hutton Award: Richard Hamilton (2008)

Medals of Dishonour, the British Museum, 25 June - 27 September 2009

Context

The artist Richard Hamilton was commissioned by the British Art Medal Trust to create a medal to be included as part of a major exhibition Medals of Dishonour, held at the British Museum in 2009. The exhibition featured medals dating from the sixteenth century to the present day, portraying political and satirical subjects and events including acts of war, injustice, racism, political scandal and corruption. Featured in the exhibition was a series of new medals, commissioned by the British Art Medal Trust from contemporary artists Jake and Dinos Chapman, William Kentridge, Grayson Perry, Ilya and Emilia Kabakov, Richard Hamilton, Mona Hatoum, Ellen Gallagher, Langlands and Bell, Cornelia Parker, Michael Landy, Yun-Fei Ji, Steve Bell and Felicity Powell [1].

The UWE Centre for Fine Print Research (CFPR) was invited by Richard Hamilton to contribute to the realisation of his medal The Hutton Award. CFPRs input included 3D modelling from Hamilton’s original image files of the artwork, production of a series of development models by 3D printing, and CNC milling of master patterns, which were used in the foundry casting process, by which the final medals were cast in solid silver.

Richard Hamilton was a member of the Independent Group, founded in 1952, and a pioneer of the British Pop Art movement. His collage Just what is it that makes today's homes so different, so appealing?, created for the poster and catalogue of the Independent group’s 1956 exhibition This is Tomorrow, became a defining image of 20th Century Art. The famous collage is composed of images from popular culture, advertising, and the modern technologies of the day [2].

Hamilton trained as an engineering draughtsman, before furthering his studies in fine art at Royal Academy Schools and the Slade School of Art, in London. He taught at the Central Schools of Arts and Crafts, and at the University of Newcastle upon Tyne [3]. In the late 1950s Hamilton visited the Hochschule fur Gestaltung in Ulm (HfG), Germany’s radical “New Bauhaus” - where students attended lectures on such subjects as mathematical logic, analytical methods, and physical and behavioural psychology, alongside their studio and workshop practice - Hamilton wrote a report on his visit, published in Design, the magazine of the National Council of Industrial Design [4, 5]. The über-rational “Ulm Style” is evident in Hamilton’s minimalist design for the sleeve of the Beatles White Album (1968), and also his 1967 rendering Toaster, which was inspired by promotional literature of the German appliance company Braun [6]. In 1984 the Swedish company Isotron invited Hamilton to undertake the industrial design of the OHIO computer. This was later developed by the company Diab Data, and presented at the Moderna Museet, in Stockholm [7].

Within his artistic practice, Hamilton has creatively exploited technologies from fields of computer graphics, design and digital print. For example, for his 1971 portfolio *Five Tyres Remoulded*, he made use of an early perspective drawing programme called CAPER (Computer Aided Perspective) developed by Sherrill F. Martin, of Kaye Instruments Inc., United States [8, 9]. In 1994, Hamilton made a new version of his collage from the 1956 *This is Tomorrow* exhibition. For the new work, *Just what is it that makes today’s homes so different* (1994) he employed a digital camera and scanner, the software Quantel Paintbox and a Canon colour laser printer, to produce an edition of 5000 copies signed by the artist [10].

Hamilton has previously engaged the CFPR digital print studio for the production of fine art prints. For his *Typo Topography of Marcel Duchamp’s Large Glass* (2003) CFPR produced large format prints from a vector graphics file created in Adobe Illustrator by Hamilton, assisted by his son Rod [11, 12]. The CFPR studio also produced the large format digital print *Shock and Awe* (2007-2008), an image of former British Prime Minister Tony Blair, whom Hamilton portrays as a wild west gunslinger. The work was printed on an inkjet canvas specially manufactured by Hewlett Packard Labs in Palo Alto, United States, and formed part of Hamilton’s show *Protest Pictures* at the 2008 Edinburgh Festival.

**Development and production of Richard Hamilton’s *Hutton Award* (2008)**

Hamilton’s title for his Medal of Dishonour *The Hutton Award*, refers to the Hutton Enquiry into the circumstances surrounding death of the UK government weapons advisor Dr David Kelly. Kelly had been exposed as the source of a BBC journalist’s statement that the Blair government had exaggerated evidence on Iraq’s weapons of mass destruction – evidence which was presented to Parliament in September 2002 and used in support of the case for war. The enquiry, which was chaired by Baron Hutton of Bresagh, concluded that the BBC’s claims were unfounded. However, critical media reports which followed the publication of Lord Hutton’s findings in January 2004 described the enquiry as a “whitewash.” [1]

The Hutton Award is a two-sided medal. On one face is a portrait in relief of Tony Blair, accompanied the Latin text CONFIDIMVS DEO DE ABSOLVTIONE: MMIV (trusting in God for absolution: 2004). The text makes reference to Tony Blair’s statements relating to his faith and the decision to go to war in Iraq. On the obverse face is a portrait of Alastair Campbell, who was government director of communications at the time of the publication of the now notorious “September dossier”, and the text HUTTON AWARD and DIALBATI (whitewash).

The 3D relief portraits of Blair and Campbell were generated from greyscale 2D image files, using the “emboss” function within Geomagic software. By this method, the lightest tones of the grayscale image produce the areas of highest relief, and the darkest tones recede as the background. Hamilton prepared the original artwork for the Hutton Award as grayscale images in Adobe Photoshop. Working from press photographs of Blair and Campbell, he used Photoshop brush tools and a Wacom tablet to remodel the images, adjusting the greyscale tones to suit the relief generation process, and exaggerating certain features of his subjects – in Hamilton’s rendering, Blair’s smile becomes a menacing grin.

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In order to preview the relief, Hamilton used the bump map function in the 3D software Lightwave. The text and perimeter rim of the medal were modelled separately, using the 3D CAD software Rhinoceros, and then imported into Geomagic, to be combined with the embossed reliefs to complete the design.

Physical development models for the medal were produced by 3D printing, using 3D Systems Thermojet, Envisiontec Digital Light Processing-based rapid prototyping systems, and CNC milling. The final master patterns were milled in dense polyurethane resin board using a Roland Modela MDX 540 3-axis milling machine, with a tapered cutter with 0.25 mm tip. Working from the master patterns Irene Gunston (Royal College of Art, London) produced wax master copies for casting into silver and bronze by BAC Castings Ltd (London), and these were hand finished at the RCA Foundry. Hamilton’s Hutton Award was exhibited as part of Medal’s of Dishonour at the British Museum. The milled resin master patterns were displayed alongside the medal itself, giving visitors to the exhibition an insight into the making of a 21st Century medal.

Richard Hamilton Hutton Award (2008) original artwork created in Adobe Photoshop

Richard Hamilton Hutton Award (2008) 3D model, Geomagic Studio
Richard Hamilton *Hutton Award* (2008) CNC milled development model in polyurethane resin board

Richard Hamilton *Hutton Award* (2008) Medal of Dishonour, 72 mm diameter
Notes on the preparation of waxes and finishing for the medal
Irene Gunston, Foundary Director, Sculpture Department, Royal College of Art

RTV Silicon rubber moulds were taken from each of the milled resin board masters supplied. Waxes were then poured into the moulds with temperature and mix being adjusted until optimum results were achieved. From these, the best were selected.

The lettering in the design proved to be a challenge for wax casting. In accordance with the artist’s original design, the lettering was kept small in size. However, because the serifs were very fine, there was a tendency for bubbles to become trapped around the edges, and for this reason it took about three tries with each to get one good cast.

The waxes were buffed up and assembled with the seam cleaned up to produce a set of double sided waxes for casting. These were then sent to a jewellery foundry (BAC Castings Ltd, London) where a selection of bronze and silver versions of the medal were cast.

On receiving the casts at the RCA Sculpture Studios, the stubs left over from the casting process were removed with hack-saws and smoothed with files. The surface was then worked with fine wire wool and wet and dry paper until a surface appropriate for hand polishing with paste was achieved. These were then cleaned with alcohol and sent to Richard Hamilton for tarnishing.