Books

-Book of the Month-Into the Black

by Rowland White published by Bantam Press

The release of a new title by Rowland White is something to be eagerly anticipated. Not only is his research meticulous, but he also knows how to write – how to tell a story entertainingly and accessibly without losing sight of the need for historical accuracy. 'Into the Black' exemplifies this. It covers the development of the Space Shuttle programme and its early missions, a subject for which a great deal of access to individuals and archives is a pre-requisite if it is to be explored in sufficient depth. Thankfully, this was forthcoming. As White recounts in his introduction, one contact led to another, and the result more than does the topic justice.

This is a tale in which military and civilian agencies and requirements are heavily interlinked, and likewise the expertise of individuals from both worlds. White affords all

equal credit, but does not shy away from discussing the inevitable conflicts between them. He sets the Shuttle programme into context well, outlining the evolution of US reconnaissance requirements during the Cold War – especially fascinating here is how cancellation of the Air Force's MOL (Manned Orbiting Laboratory) project, and the sudden availability of its cadre of pilots, coalesced with the beginnings of the Shuttle; not that it was an approved programme at that stage, nor one that would materialise for more than a decade. That concept, as White vividly describes, was the brainchild of a team in NASA's Manned Spacecraft Center in Houston, led by its director of engineering and development Max Faget. One of the many delightful asides in this book describes how the new re-usable spaceplane was initially dubbed "the DC-3 Study" "in honour of an earlier pioneering flying machine".

'the DC-3 Study' "in honour of an earlier pioneering flying machine". From then, even after President Nixon's January 1972 announcement of the Shuttle programme, it was a long and sometimes difficult road to the first flight. There were personal setbacks as well as professional ones, a somewhat incongruous but no less unfortunate example being the accident suffered by astronaut Fred Haise in his Vultee BT-13 Valiant, mocked-up as a Japanese 'Val' dive-bomber for Confederate Air Force 'Tora! Tora! Tora!' re-enactments. Haise suffered severe burns, but lived to fly another day. Indeed, it was he, along with Gordo Fullerton, who took the controls of *Enterprise* for its inaugural free flight on 12 August 1977, launched from the back of the specially-modified Boeing 747 Shuttle Carrier Aircraft. White is excellent at weaving the personal 'back-stories' of the early Shuttle astronauts into a coherent, engaging narrative.

Coherent, engaging narrative. 'Into the Black's' pièce de résistance is its description of the first orbital spaceflight by *Columbia* starting on 12 April 1981, crewed by John Young and Bob Crippen. While NASA put on a brave face to the outside world, missing heat shield tiles led to more than a few anxious moments in Mission Control – and to efforts by the military's National Reconnaissance Office to capture high-resolution images of *Columbia* using a USAF spy satellite, which confirmed that the absent tiles posed no critical threat. This element of mission STS-1 has never before been explored in such depth, and is worth the book's purchase price alone.

An absolutely excellent volume, one bound to engage even those for whom spaceflight is not a primary interest, 'Into the Black' deserves all the plaudits it has already received. **Ben Dunnell**

ISBN 978-0-593-06436-8; 6.25in x 9.5in hardback; 436 pages, illustrated; **£18.99** ★ ★ ★ ★



Arab MiGs Volume 6

by Tom Cooper and David Nicolle published by Harpia Publishing (Casemate UK)

Usefully, this title covering the second part of the October 1973 War begins with a 31-page addenda/errata section relating to the previous volumes. It then continues in the familiar high-quality Harpia vein. There are many useful diagrams identifying such things as dispositions of major units, while one drawn on the basis of a US Army Missile Command document entitled 'Scud-B Study' shows positions and assumed ranges of Egyptian-operated FROG-7 and SS-1C 'Scud-B' surface-to-surface missiles. Others describe loft-bombing tactics by Israeli Phantoms and Skyhawks, various battles, personal stories and so on.

As far as aircraft types are concerned, the MiG-23 was said to be a great disappointment to Egypt, lacking manoeuvrability and with an old weapons system – all had been withdrawn and placed into storage by 1976. Mirages were also in service with the Egyptian Air Force, while other types covered include the Su-7BMK, MiG-15, -17, -21 and -25, L-29 Delfin, Do 27, Tu-16M, An-12 and Mi-4. There are a number of nice colour side views of many of these in appendix III, while IV lists Czech-built MiG-15bis fighter-bombers supplied to Iraq to replace Hawker Furies. A detailed index enables easy access to aircraft types, pilots, squadrons and other details for Algeria, Egypt, France, Iraq, Israel, Libya, Palestine, the Soviet Union and Syria.

There is much of interest here for aviation historians and enthusiasts with many illustrations. Unfortunately, one recurring negative about Harpia's volumes comes up again, as a number of photographs are not very well reproduced. While the originals were probably from private sources and of variable quality, they could have been cleaned up a bit better. In general, though, the book is a very fine effort. *Mike Hooks*

ISBN 978-0-9854554-6-0; 8.25in x 11in softback; 256 pages, illustrated; **£41.99**

The Fallen Few of the Battle of Britain

by Nigel McCrery, Norman Franks and Edward McManus published by Pen & Sword

The official dates of the Battle of Britain are given as 10 July to 31 October 1940, within which period 2,917 pilots are recorded as having seen action. They came not only from





'Much of interest for historians and enthusiasts'



'A very useful reference'