



SUPERSONIC

The Design and Lifestyle of Concorde

Lawrence Azerrad

SUPE



RSONIC

The Design and Lifestyle of Concorde

© Prestel Verlag, Munich • London • New York 2018
A member of Verlagsgruppe Random House GmbH
Neumarkter Strasse 28 • 81673 Munich

In respect to links in the book, Verlagsgruppe Random House expressly notes that no illegal content was discernible on the linked sites at the time the links were created. The Publisher has no influence at all over the current and future design, content or authorship of the linked sites. For this reason Verlagsgruppe Random House expressly disassociates itself from all content on linked sites that has been altered since the link was created and assumes no liability for such content.

All images reproduced by permission. See page 189 for full list of credits pertaining to artists' rights and photography.

Prestel Publishing Ltd.
14-17 Wells Street
London W1T 3PD

Prestel Publishing
900 Broadway, Suite 603
New York, NY 10003

Library of Congress Cataloging-in-Publication Data

Names: Azerrad, Lawrence, author.

Title: Supersonic : the design and lifestyle of Concorde / by Lawrence Azerrad ; foreword by Sir Terence Conran ; afterword by Cindy Crawford and Andrew Macpherson.

Description: Munich ; New York : Prestel, 2018.

Identifiers: LCCN 2018007153 | ISBN 9783791384092 (hardback)

Subjects: LCSH: Concorde (Jet transports) | BISAC: TRANSPORTATION / Aviation / History. | TRANSPORTATION / Aviation / General. | DESIGN / Industrial.

Classification: LCC TL685.7 .A99 2018 | DDC 629.133/349--dc23

LC record available at <https://lccn.loc.gov/2018007153>

A CIP catalogue record for this book is available from the British Library.

Editorial Direction: Holly La Due

Copyediting: Kara Pickman

Proofreading: Susan Richmond

Production: Luke Chase

Design: Lawrence Azerrad and Frankie Hamersma for LADdesign Inc.

Typeset in DINPro and Chalet Paris Nineteen Eighty



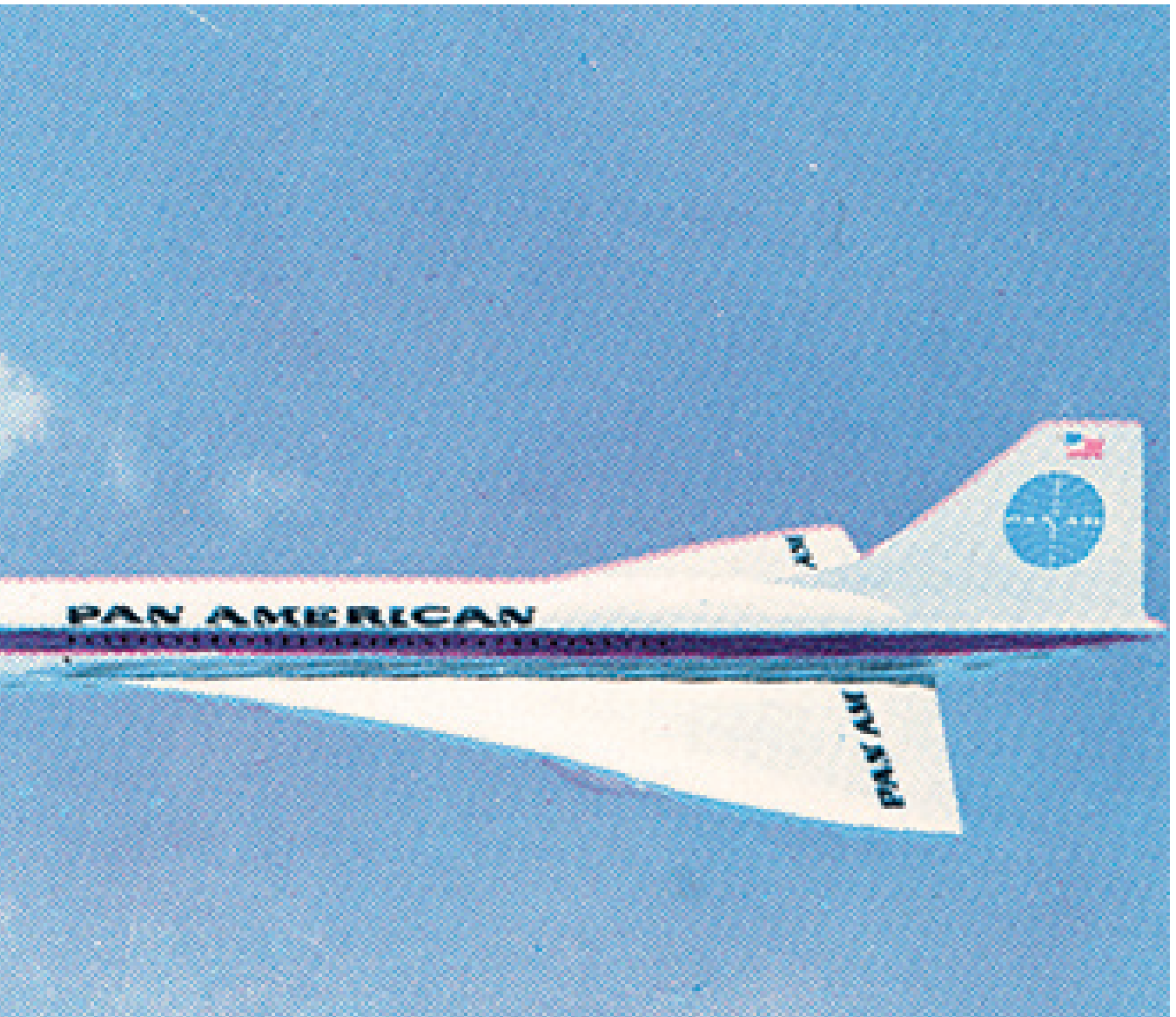
Verlagsgruppe Random House FSC® N001967

Printed in China

ISBN 978-3-7913-8409-2

www.prestel.com





SUPERSONIC

The Design and Lifestyle of Concorde

Lawrence Azerrad

Foreword by Sir Terence Conran

Afterword by Cindy Crawford and Andrew Macpherson

PRESTEL

Munich • London • New York



Original interior design of British Airways Concorde cabin, 1974



French postcard showing preproduction Concorde, 1976

TABLE OF CONTENTS

008	Foreword
011	Introduction
016	The Dawn of the Supersonic Airliner
054	Design: The Look and Feel of Concorde 1956–60
080	Lifestyle: The Designers 1960–81
128	The New Look: Design Diversity 1982–2003
184	Afterword
186	Acknowledgments
188	Notes and Image Credits



Sir Terence Conran with actor
Nigel Havers and his wife
Polly Havers on Concorde,
October 24, 2003

FOREWORD

Sir Terence Conran

Concorde is the most iconic aircraft of all time and I can honestly say that it is the most beautiful and exhilarating man-made object I have ever seen. It is one of the few designs to take my breath away. It had that magic ingredient of the truly special and it inspired the imagination of millions of people all over the world.

It was instantly recognizable, immediately eye-catching, unspeakably elegant and so it became one of the great design icons of the modern age.

Watching Concorde fly was to witness that rare, dynamic combination of graceful elegance with the raw energy and power of supersonic flight. Flying on Concorde was something different altogether though—that terrific, exhilarating surge, the blast of power, and then the momentary feeling that you had left your stomach behind in the terminal.

Concorde arrived in a relatively gloomy period in the twentieth century and immediately became a global symbol of luxury, glamour, ambition, and human achievement. In a heartbeat it raised the spirit and opened our eyes to something that had never been experienced before—supersonic travel. Just the very idea was utterly seductive.

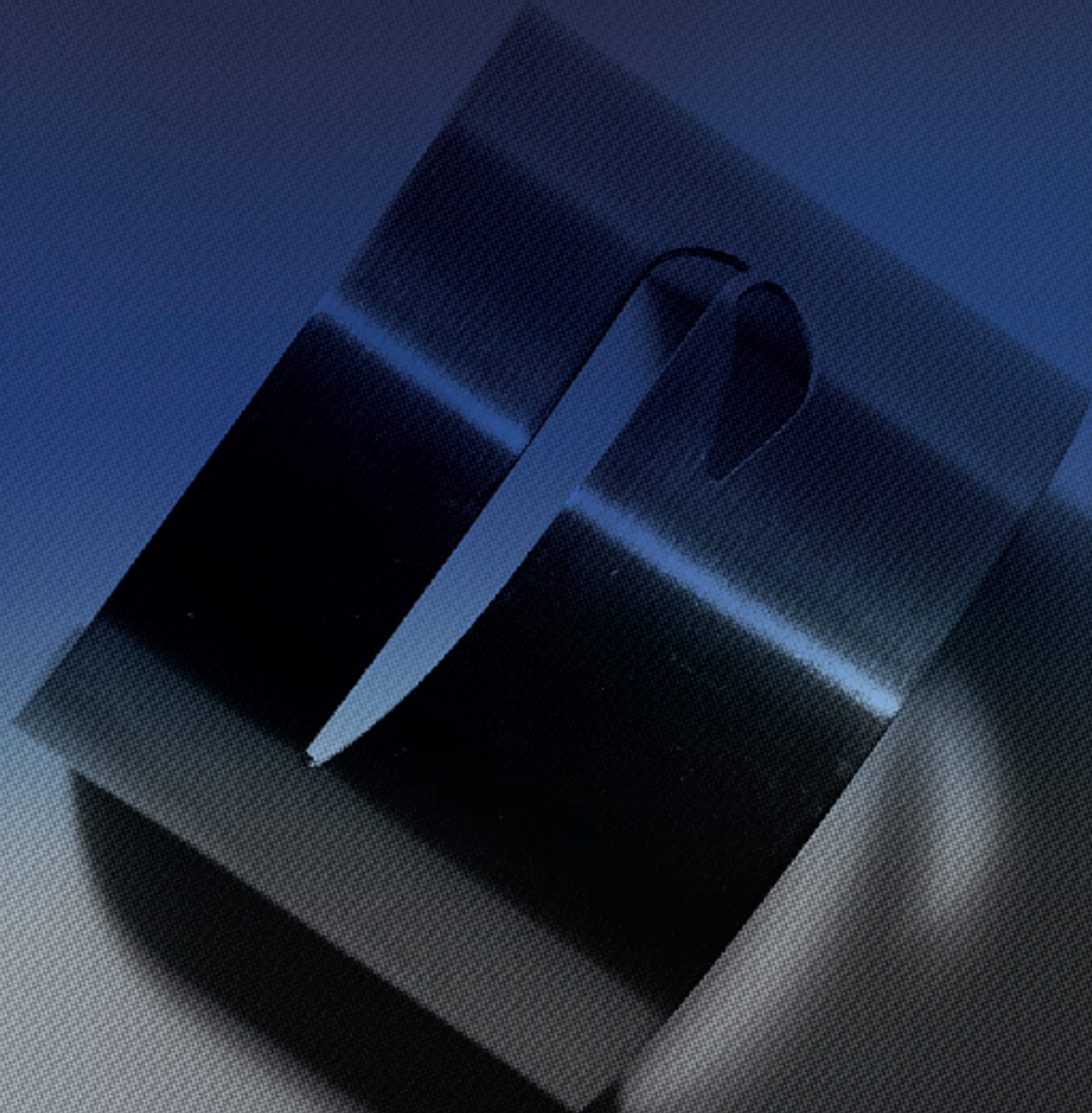
Concorde was a head turner, so far ahead of its time that when it made its first speed-defying passenger flight across the Atlantic in 1976 it gave us all an irresistible glimpse into the future, captivating us instantly and daring us to dream. It remains as thrilling today as it was when it first pushed out of the aerodrome in Filton, England.

I have always felt that by very definition, planes are beautiful objects because their functionality requires a graceful solution and Concorde was the most stunning of all. It became *the* aircraft of the twentieth century. It combined exquisite beauty and form with enormous engineering invention and excellence. It was an unparalleled recipe of art, design, science, engineering, and bold imaginative thinking.

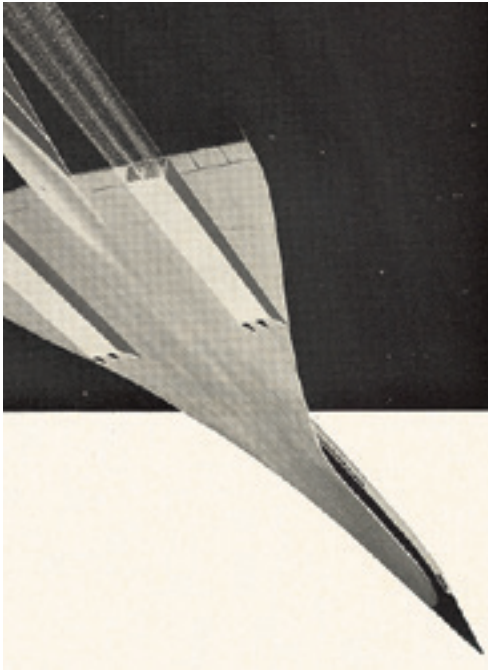
From the first moment I heard about the project, it captured my imagination. It wasn't just me; the jet inspired millions of people around the world. It became the embodiment of thoughtful, forward-thinking design.

The key to Concorde's success was developing the technology to make the ideas a reality and bringing this most fantastic of dreams to life. Working side by side, the British and French engineers overcame every obstacle and the project became a great melting pot of ideas and technical advances—it was *the* great moment for European aviation. To work on the project must have been a dream come true.

Do not think I exaggerate when I say that Concorde is the single most important piece of design in my long lifetime. Will we see anything quite so elegant, beautiful, and optimistic again? I'm sad to say perhaps not, but that may be the challenge for our great designers, engineers, innovators, and even artists. Can you work together to create something so beautiful, powerful, and iconic it pushes the boundaries of our imagination? Can you make us dream like that again? Can you show us the future?



INTRODUCTION



Conceived in 1962 when technology and progress were the answers to everything and the sky was no longer a limit...

It began with a Concorde model kit. Even disassembled, the swept-back delta wings affixed to the kit frame excited my imagination and motivated me to glue all the pieces together as quickly as possible. The final 1:72 scale version of the world's first commercial supersonic jet awed me and stirred nascent thoughts of becoming a designer someday. Posed dynamically on the kit's accompanying stand, it was the embodiment of pure speed. And not just any speed, but Mach 2—*twice the speed of sound*. Everything about the shape of Concorde announced *FAST*. It made a lasting impression that deepened over the years into a lifelong obsession—if not devotion.

At present my ever-growing collection of Concorde memorabilia encompasses about seven hundred

items, including parting gifts informally called “prez-zies” that were handed out to the well-fed and well-lubricated passengers who could splurge on the ticket price, which was \$12,000 round-trip in 2003. This was swag before swag was a thing. Model kits, stamps, matchbooks, flasks, luggage tags, lighters, and more were given to passengers, while some items were proudly stolen by those besotted with the Concorde lifestyle, such as menus designed by Christian Lacroix (b. 1951) and Jean Boggio (b. 1963), dinnerware by Raymond Loewy (1893–1986), and napkin rings by Sir Terence Conran (b. 1931)—all from the twenty-seven years in which Concorde graced the skies.

Until its last flight in 2003, the silhouette of Concorde streaking through the clouds inspired a rare sense

OPPOSITE
Detail of Ferranti Concorde
engagement advertisement
(see page 31), 1966

RIGHT
Royal Mail four pence
stamp sheet, c. 1960s



of wonder. Children cheered when they spotted it in the sky. Devotees who lacked the fortune to actually zip through the stratosphere inside its slender fuselage penned poems to honor its soaring beauty. To this day no other form of travel affords passengers the unique experience of flying twice the speed of sound. Passengers on westbound transatlantic flights arrived at their destination at an earlier local time than the time they left their departure city. Regular commercial planes plodding along at 550 mph (885 kmh) a mere 30,000 feet (9000 meters) above ground appeared to travel backward when spied from inside the speeding Concorde. In 1985 a Concorde flight allowed Phil Collins to perform his hits "Against All Odds (Take a Look at Me Now)" and "In the Air Tonight" on the same day at both London's Wembley Stadium and Philadelphia's John F. Kennedy Stadium for the globally televised Live Aid concerts. As German photographer Wolfgang Tillmans rhapsodized in the artist book *Concorde* for his 1997 exhibition *I Didn't Inhale* at London's Chisenhale Gallery:

Its futuristic shape, speed and ear-numbing thunder grabs people's imagination today as much as it did when it first took off in 1969. It's an environmental nightmare conceived in 1962 when technology and progress was the answer to everything and the sky was no longer a limit... For the chosen few, flying Concorde is apparently a glamorous but cramped and slightly boring routine whilst to watch it in the air, landing or taking-off is a strange and free spectacle, a super modern anachronism and an image of the desire to overcome time and distance through technology.¹

Despite Concorde's unparalleled success, the flag-waving pride it instilled among the British and French, and the glitzy celebrity of its associated jet-set lifestyle, the at one time fourteen-strong fleet could not fly forever. Only twenty Concordes were ever built, and the six that were not included in the operational fleets of British Airways and Air France were mined for parts. On July 25, 2000, Concorde suffered its only fatal crash during its twenty-seven years in operation. All 109 passengers and crew on board Air France Flight 4590 were killed, as were four people in the hotel it leveled. The accident dealt a devastating blow to an aging fleet. In 2003 British Airways and Air France announced Concorde's official retirement. The crash, along with reduced air travel following the attacks of September 11, 2001, and rising maintenance costs, created an insensible budgetary model. Concorde's last flight departed from John F. Kennedy International Airport in New York for Heathrow Airport in London on October 24, 2003 (Air France's final Concorde flight took place on June 27th). All one hundred seats were sold, and passengers included model Christie Brinkley, actress Joan Collins ("a tragedy, honestly a tragedy!"²), and an Ohio couple who had snagged tickets on eBay for \$60,000 (one way!). The final flight inspired a local London musical production based on people's Concorde experiences, was greeted by a large crowd of enthusiastic spectators, and elicited a surprising outpouring of grief.

It was as if a glorious future had been glimpsed only to be rejected out of hand. Imagine abandoning lifesaving MRI technology after a few years, or returning our smartphones for the mindfulness of

rotary dialing. Yet all is not lost. For some time now NASA has been developing a “low-boom” Quiet Supersonic Transport (QueSST), and flight tests for the “new Concorde” are planned for as early as 2021. In 2015 Airbus filed a patent for a superjet dubbed the “Son of Concorde” that would fly at Mach 4 (2,500 mph/4,023 kmh) and cut the travel time from New York to London to an hour! And a private supersonic jet called the Aerion AS2 is expected to enter service in 2023. Meanwhile, a new breed of visionaries have been spending their billions developing the commercial possibilities of post-supersonic flight. Richard Branson (Virgin Galactic), Elon Musk (SpaceX), and Jeff Bezos (Blue Origin) are promising seemingly fantastic results within a decade or two, such as rocket flights to anywhere on the planet in less than an hour. Notably, their respective promotional campaigns recall the original brochures and advertisements for Concorde in trade magazines, firing up the imagination and playing off the desire to fly ahead of the curve.

2019 marks fifty years since Concorde’s first successful test flight on March 2 in 1969. It also marks sixteen years since I experienced my one and only Concorde flight from JFK to Heathrow. What had been earmarked for the “someday” column became an imperative when, just shy of my thirtieth birthday, Concorde announced service would be ending. A native Californian, the 9 a.m. departure out of JFK felt like 6 a.m. to me, and then—in a flash—it was over. In between, I made memories I will never forget: the rapid tranquility of check-in, the quiet elegance of the Concorde room, and the object of fascination, parked and waiting on the tarmac.

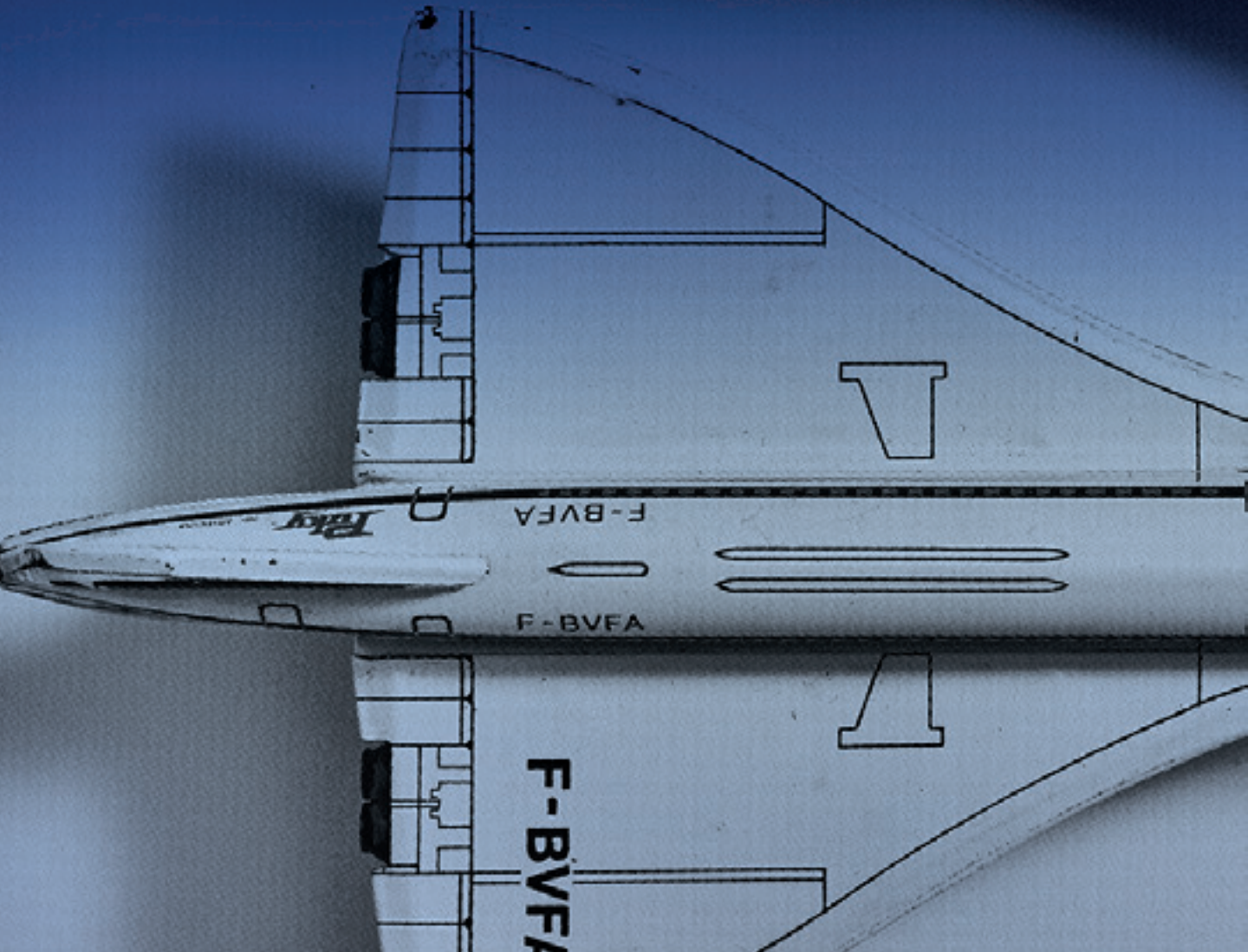
I had a window seat. I remember being surprised at how tiny the windows were. But at takeoff was when the difference could really be felt. Every time Concorde departed from JFK, it had to perform a noise abatement maneuver—a sharp roll, turn, then spring out of the turn, almost instantly. I felt like I was in a fighter jet—with a hundred other people. Breaking the sound barrier was barely noticeable. I heard it because I was watching and listening for it—the sound was like someone popped a balloon in the next room. There was lunch, champagne, and flowers in the lavatory. I got the sense that the crew members took great care, and were the best in the field. Even though the fastest flight I had been on was over too quickly, the end of the flight was the real beginning of the journey that led to this book.

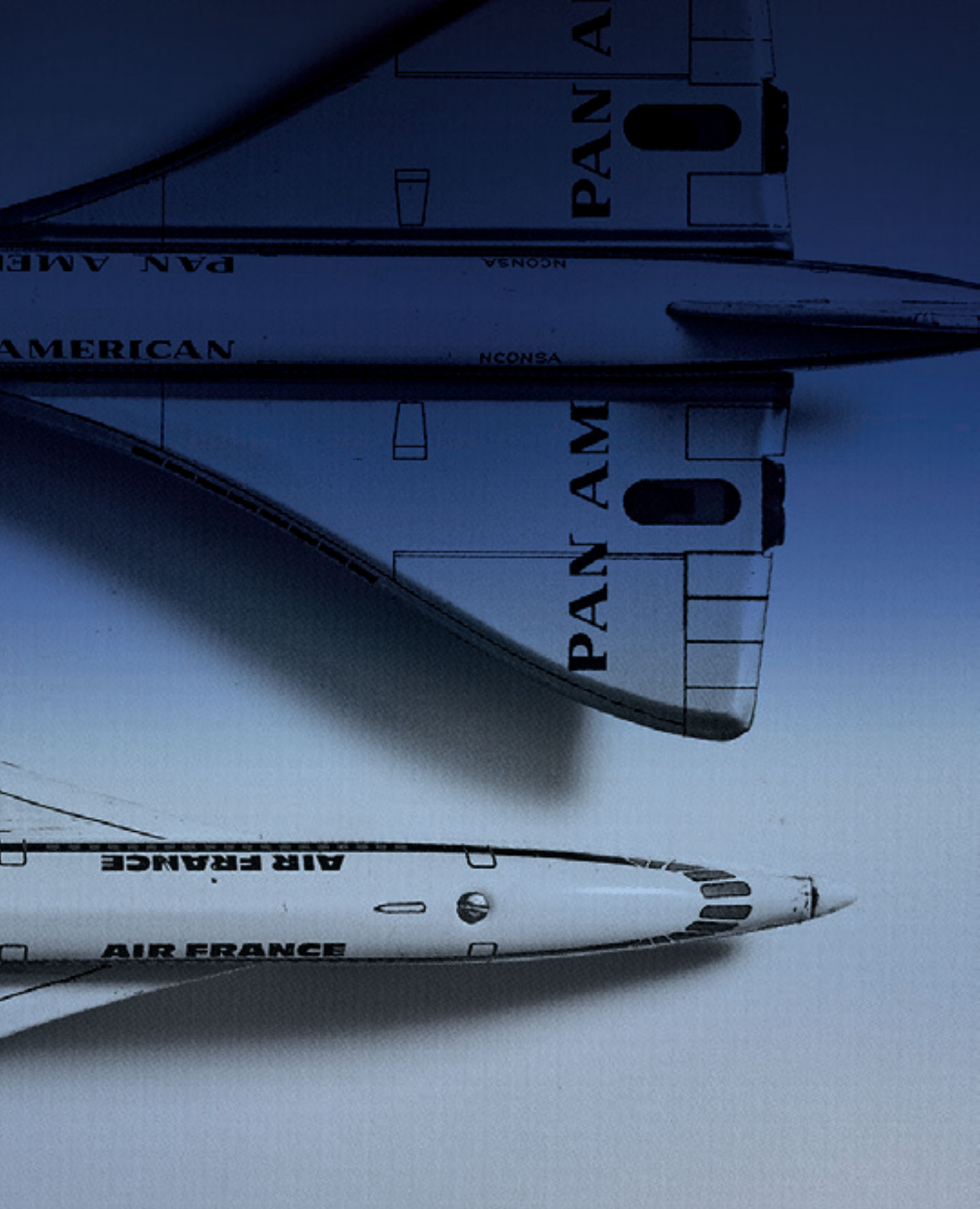
As a designer, I’m particularly interested in Concorde’s design legacy, from the marvel of its aerodynamic perfection and the refinements of its interior cabin experience to the various and sundry objects designed to support and promote its brand. Some of the most interesting items in my collection are the brochures from the 1970s that contextualize the supersonic jet culture, lifestyle, and fashion. The photography, the graphic language, and the typography are all calibrated to excite an aura of speed, glamour, and progress. Concorde was the promise of tomorrow delivered in the here and now. It’s time we fully appreciate the lasting significance of our first—and so far sole—supersonic commercial airliner.

Lawrence Azerrad

1

THE
DAWN OF
THE SUPERSONIC
AIRLINER





PAN AM

PAN AME

NCONSA

AMERICAN

NCONSA

PAN AM

AIR FRANCE

AIR FRANCE



Concorde was the promise of tomorrow delivered in the here and now.

Since the advent of powered flight on the North Carolina beaches of Kitty Hawk in 1903—an almost slapstick production when you watch the old reels on YouTube³—it could be argued that no passenger plane has captured the public imagination as magnificently as the supersonic Concorde. Affectionately christened *L'Oiseau blanc* (the white bird) by the French, Concorde (smartly dressed without a definite article by the British) graced our skies—at least within the narrow purview of its approved flight paths—for twenty-seven improbable years. From every perspective, our history's sole dalliance with a supersonic passenger plane epitomized the most important equation of our moneyed age: not $E = mc^2$, but time = money. That it did so with such panache only added to its conspicuous luster.

Concorde's signature form aroused the sort of fandom unimaginable for a typical (i.e., economical) subsonic commercial airliner. Concorde was more spacecraft than passenger airplane. Sleek, graceful, and doubly white to deflect the heat of its extraordinary speed, it was an aspirational vision that might have been left on the cutting-room floor of Stanley Kubrick's *2001: A Space Odyssey* (1968). But it was miraculously, gloriously real. As its needle-pointed, delta-winged shape soared toward the stratosphere, one felt touched by the future and its attendant sense of hope and promise, whether on the ground or snug in its luxuriously appointed fuselage. It's what the Space Shuttle *should* have looked like.



OPPOSITE

Detail of Royal Mail First Day postage cover commemorating the maiden test flight of Concorde 001 [see page 74], 1969

RIGHT

Preproduction model Concorde 002 visits Los Angeles International Airport on a promotional tour, October 23, 1974



Even the high-powered executives, heads of state, and rock stars who'd seen it all couldn't help but be enthralled by the fighter-jet-like ascent toward 55,000 feet (16,764 meters) (twice the altitude of commercial airplanes) and the truly rare experience of cruising at Mach 2 (1,350 mph/2,172 kmh), roughly twice the average speed of a commercial flight, while viewing the actual curvature of the Earth outside their windows. Not to mention the mind-bending phenomena resulting from the precipitous speeds, such as the cabin stretching by as much as 7 to 10 inches (18 to 25 centimeters) during flight due to the heating of the airframe, or that it traveled 10 miles (16 kilometers) in the time it took to fill a champagne glass.

More than anything, the aura of postwar optimism propelled the development of the world's first supersonic passenger plane. To the public at the time, flying faster than the speed of sound in order to travel from London to New York in just three hours seemed like outright science fiction. But to those inspired by the scientific, mathematical, and technological advances necessitated by World War II, to aim for the impossible was precisely the point. As John F. Kennedy put it in his famous address at Houston's Rice University on September 12, 1962: "We choose to go to the moon in this decade and do the other things, not because they are easy, but because they are hard, because that goal will serve to organize and measure the best of our energies and skills, because that challenge is one that we are willing to accept,

An aura of postwar optimism propelled the development of the world's first supersonic passenger plane.



OPPOSITE

Artist's rendering of a never-realized Concorde in TWA livery, c. 1960s

TOP TO BOTTOM

Up Up and Away: A Dancing Party with Victor Silvester and his Orchestra, 12-inch LP album cover, 1973

Paper cutout model toy of a never-realized Pan Am Concorde, c. 1960s

Packaging for Modern Aircraft, c. 1960s

