















I've been asleep in a small, windowless room, a room so dark it's as if I'm below the waterline of a ship. My head is near the wall. Through the wall comes the sound of steady rushing, the sense of numberless particles slipping past, as water rounds a stone in a stream, but faster and more smoothly, as if the vessel parts its medium without touch.

I'm alone. I'm in a blue sleeping bag, in blue pajamas that I unwrapped on Christmas morning several years ago and many thousands of miles from here. There is a gentle swell to the room, a rhythm of rolling. The wall of the room is curved; it rises and bends up over the narrow bed. It is the hull of a 747.

When someone I've just met at a dinner or a party learns that I'm a pilot, he or she often asks me about my work. These questions typically relate to a technical aspect of airplanes, or to a view or a noise encountered on a recent flight. Sometimes I'm asked where I fly, and which of these cities I love best.

Three questions come up most often, in language that hardly varies. Is flying something I have always wanted to do? Have I ever seen anything "up there" that I cannot explain? And do I remember my first flight? I like these questions. They seem to have







arrived, entirely intact, from a time before flying became ordinary and routine. They suggest that even now, when many of us so regularly leave one place on the earth and cross the high blue to another, we are not nearly as accustomed to flying as we think. These questions remind me that while airplanes have overturned many of our older sensibilities, a deeper part of our imagination lingers and still sparks in the former realm, among ancient, even atavistic, ideas of distance and place, migrations and the sky.

Flight, like any great love, is both a liberation and a return. Isak Dinesen wrote in *Out of Africa:* "In the air you are taken into the full freedom of the three dimensions; after long ages of exile and dreams the homesick heart throws itself into the arms of space." When aviation began, it was worth watching for its own sake; it was entertainment, as it still is for many children on their early encounters with it.

Many of my friends who are pilots describe airplanes as the first thing they loved about the world. When I was a child I used to assemble model airplanes and hang them in my bedroom, under a ceiling scattered with glow-in-the-dark stars, until the day skies were hardly less busy than Heathrow's, and at night the outlines of the dark jets crossed against the indoor constellations. I looked forward to each of my family's occasional airplane trips with an enthusiasm that rarely had much to do with wherever we were going. I spent most of my time at Disney World awaiting the moment we would board again the magical vessel that had brought us there.

At school nearly all my science projects were variations on an aerial theme. I made a hot-air balloon from paper, and sanded wings of balsa wood that jumped excitedly in the slipstream from a hairdryer, as simply as if it were not air but electricity that had







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been made to flow across them. The first phone call I ever received from someone other than a friend or relative came when I was thirteen. My mom passed me the telephone with a smile, telling me that a vice president from Boeing had asked to speak with me. He had received my letter requesting a videotape of a 747 in flight, to show as part of a science project about that airplane. He was happy to help; he wished only to know whether I wanted my 747 to fly in VHS or Betamax format.

I am the only pilot in my family. But all the same, I feel that imaginatively, at least, airplanes and flying were never far from home. My father was completely enthralled by airplanes—the result of his front-row seat on the portion of the Second World War that took place in the skies above his childhood home in West Flanders. He learned the shapes of the aircraft and the sounds of their engines. "The thousands of planes in the sky were too much competition for my schoolbooks," he later wrote. In the 1950s, he left Belgium to work as a missionary in the Belgian Congo, where he first flew in a small airplane. Then he sailed to Brazil, where in the 1960s he was one of surely not very many priests with a subscription to Aviation Week magazine. Finally he flew to America, where he met my mother, went to business school, and worked as a manager in mental health services. Airplanes fill his old notes and slides.

My mother, born under the quieter skies of rural Pennsylvania, worked as a speech therapist and had no particular interest in aviation. Yet I feel she was the one who best understood my attachment to the less tangible joys of flight: the old romance of all journeys, which she gave to my brother and me in the form of stories like *Stuart Little* and *The Hobbit*, but also a sense of what we see from above or far away—the gift, the destination, that flying makes not of a distant place but of our home. Her favorite hymn







was "For the Beauty of the Earth," a title, at least, that we agreed might be worth printing on the inside of airplane window blinds.

My brother is not a pilot. His love is not for airplanes but for bicycles. His basement is full of bikes that are works in progress, that he's designing and assembling from far-gathered parts, for me or for a grateful friend. When it comes to his bike frames, he is as obsessed with lightness as any aeronautical engineer. He likes to make and fix bikes even more than he likes to ride them, I think.

If I see my brother working on one of his two-wheeled creations, or notice that he's reading about bikes on his computer while I am next to him on the couch reading about airplanes, I may remember that the Wright brothers were bicycle mechanics, and that their skyfaring skills began with wheels, a heritage that suddenly becomes clear when you look again at their early airplanes. When I see pictures of such planes I think, if I had to assemble anything that looked like this, I would start by calling on the skills of my brother—even though there was the time I got him in trouble with our parents for skipping his chores, and so he taped firecrackers to one of my model airplanes and lit the fuses and waited just the right number of seconds before throwing the model from an upstairs window, in a long arc over the backyard.

As a teenager I took a few flying lessons. I thought that I might one day fly small airplanes as a hobby, on weekend mornings, an aside to some other career. But I don't remember having a clear wish to become an airline pilot. No one at school suggested the career to me. No pilots lived in our neighborhood; I don't know if there were any commercial pilots at all in our small town in western Massachusetts, which was some distance from any major airport. My dad was an example of someone who enjoyed airplanes whenever he encountered them, but who had decided not to make







them his life's work. I think the main reason I didn't decide earlier to become a pilot, though, is because I believed that something I wanted so much could never be practical, almost by definition.

In high school I spent my earnings from a paper route and restaurant jobs on summer homestay programs abroad, in Japan and Mexico. After high school I stayed in New England for college but also studied in Belgium, briefly reversing the journey my father had made. After college I went to Britain to study African history, so that I could live in Britain and, I hoped, in Kenya. I left that degree program when I finally realized that I wanted to become a pilot. To repay my student loans and save the money I expected to need for flight training, I took a job in Boston, in the field—management consulting—that I thought would require me to fly most often.

In high school I certainly wanted to see Japan and Mexico, and to study Japanese and Spanish. But really, what attracted me most to such adventures was the scale of the airplane journeys they required. It was the possibility of flight that most drew me to far-off summer travels, to degree programs in two distant lands, to the start of the most literally high-flying career I could find in the business world, and at last—because none of even those endeavors got me airborne nearly often enough—to a career as a pilot.

When I was ready to start my flight training, I decided to return to Britain. I liked many aspects of the country's historic relationship with aviation, its deep tradition of air links with the whole world, and the fact that even some of the shortest flights from Britain are to places so very different from it. And, not least, I liked the idea of living near the good friends I'd made as a postgraduate there.

I began to fly commercially when I was twenty-nine. I first flew







the Airbus A320 series airliners, a family of narrow-bodied jets used on short- to medium-distance flights, on routes all around Europe. I'd be woken by an alarm in the 4 a.m. darkness of Helsinki or Warsaw or Bucharest or Istanbul, and there would be a brief bleary moment, in the hotel room whose shape and layout I'd already forgotten in the hours since I'd switched off the light, when I'd ask myself if I'd only been dreaming that I became a pilot. Then I would imagine the day of flying ahead, crossing back and forth in the skies of Europe, almost as excitedly as if it was my first day. I now fly a larger airplane, the Boeing 747. On longer flights we carry additional pilots so that each of us can take a legally prescribed break, a time to sleep and dream, perhaps, while Kazakhstan or Brazil or the Sahara rolls steadily under the line of the wing.

Frequent travelers, in the first hours or days of a trip, may be familiar with the experience of jet lag or a hotel wake-up call summoning them from the heart of night journeys they would otherwise have forgotten. Pilots are often woken at unusual points in their sleep cycles and perhaps, too, the anonymity and nearly perfect darkness of the pilot's bunk form a particularly clean slate for imagination. Whatever the reason, I now associate going to work with dreaming, or at least, with dreams recalled only because I am in the sky.

A chime sounds in the darkness of the 747's bunk. My break is over. I feel for the switch that turns on a pale-yellow beam. I change into my uniform, which has been hanging on a plastic peg for something like 2,000 miles. I open the door that leads from the bunk to the cockpit. Even when I know it's coming—and it's frequently hard to







know, depending as it does on the season, the route, the time, and the place—the brightness always catches me off guard. The cockpit beyond the bunk is blasted with a directionless daylight so pure and overwhelming, so alien to the darkness I left it in hours ago and to the gloom of the bunk, that it is like a new sense.

As my eyes adjust, I look forward through the cockpit windows. At this moment it's the light itself, rather than what it falls upon, that is the essential feature of the earth. What the light falls upon is the Sea of Japan, and far across this water, on the snowcapped peaks of the island nation we are approaching. The blueness of the sea is as perfect as the sky it reflects. It is as if we are slowly descending over the surface of a blue star, as if all other blues are to be mined or diluted from this one.

As I move forward in the cockpit to my seat on the right side of it, I think briefly back to the trip I made to Japan as a teenager, about two decades ago, and to the city this plane left only yesterday, though *yesterday* isn't quite the right word for what preceded a night that hardly deserves the name, so quickly was it undone by our high latitudes and eastward speed.

I remember that I had an ordinary morning in the city. I went to the airport in the afternoon. Now that day has turned away into the past, and the city, London, lies well beyond the curve of the planet.

As I fasten my seat belt I remember how we started the engines yesterday. How the sudden and auspicious hush fell in the cockpit as the airflow for the air-conditioning units was diverted; how air alone began to spin the enormous techno-petals of the fans, spin them and spin them, faster and faster, until fuel and fire were added, and each engine woke with a low rumble that







grew to a smooth and unmistakable roar—the signature of one of our age's most perfect means of purifying and directing physical power.

In legal terms a journey begins when "an aircraft moves under its own power for the purpose of flight." I remember the aircraft that moved ahead of us for this purpose and lifted ahead of us into the London rain. As that preceding aircraft taxied into position its engines launched rippling gales that raced visibly over the wet runway, as if from some greatly speeded-up video recording of the windswept surface of a pond. When *takeoff thrust* was *set* the engines heaved this water up in huge gusting night-gray cones, new clouds cast briefly skyward.

I remember our own takeoff roll, an experience that repetition hasn't dulled: the unfurling carpet of guiding lights that say here, the voice of the controller that says now; the sense, in the first seconds after the engines reach their assigned power and we begin to roll forward, that this is only a curious kind of driving down an equally curious road. But with speed comes the transition, the gathering sense that the wheels matter less, and the mechanisms that work on the air—the control surfaces on the wings and the tail—more. We feel the airplane's dawning life in the air clearly through the controls, and with each passing second the jet's presence on the ground becomes more incidental to how we direct its motion. Yesterday we were flying on the earth, long before we left it.

On every takeoff there is a speed known as V1. Before this speed we have enough room left ahead of us on the runway to stop the takeoff. After this speed we may not. Thus committed to flight, we continued for some time along the ground, gathering still more speed to the vessel. A few long seconds after V1 the jet reached its next milestone of velocity and the captain called: "Rotate." As the







lights of the runway started to alternate red and white to indicate its approaching end, as the four rivers of power that summed to nearly a quarter of a million pounds of thrust unfurled over the runway behind us, I lifted the nose.

As if we had only pulled out of a driveway, I turned right, toward Tokyo.

London, then, was on my side of the cockpit. The city grew bigger before it became smaller. From above, still climbing, you realize that this is how a city becomes its own map, how a place becomes whole before your eyes, how from an airplane the idea of a city and the image of a city itself can overlay each other so perfectly that it's no longer possible to distinguish between them. We followed London's river, that led the vessels of a former age from their docks to the world, as far as the North Sea. Then the sea turned, and Denmark, Sweden, Finland passed beneath us, and night fell—the night that both began and ended over Russia. Now I'm in the new day's blue northwest of Japan, waiting for Tokyo to rise as simply as the morning.

I settle myself into my sheepskin-covered seat and my particular position above the planet. I blink in the sun, check the distance of my hands and feet from the controls, put on a headset, adjust the microphone. I say good morning to my colleagues, in the half-ironic sense that long-haul pilots will know well, that means, on a light-scrambling journey, I need a minute to be sure where it is morning, and for whom—whether for me, or the passengers, or the place below us on the earth, or perhaps at our destination. I ask for a cup of tea. My colleagues update me on the hours I was absent; I check the computers, the fuel gauges. Small, steady green digits show our expected landing time in Tokyo, about an hour from now. This is expressed in Greenwich Mean Time. In Greenwich it









is still yesterday. Another display shows the remaining nautical miles of flight, a number that drops about one mile every seven seconds. It is counting down to the largest city that has ever existed.

I am occasionally asked if I don't find it boring, to be in the cockpit for so many hours. The truth is I have never been bored. I've sometimes been tired, and often I've wished I were heading home, rather than moving away from home just about as quickly as it is possible to do so. But I've never had the sense that there was any more enjoyable way to spend my working life, that below me existed some other kind of time for which I would trade my hours in the sky.

Most pilots love their work and have wanted to do it for as long as they can remember. Many began their training as soon as they could, often in the military. But when I started my training course in Britain, I was surprised at how many of my fellow trainees had traveled quite far down another path—they were medical students, pharmacists and engineers, who, like me, had decided to return to their first love. For me, coming later to the profession has been an opportunity to think about why many of my colleagues and I were drawn back so strongly to a half-forgotten notion, one that we shared as children.

Some pilots enjoy the hand-to-eye mechanics that are related to movement in three dimensions, particularly the challenges that cluster at the beginning and end of every flight. Others have a natural affinity for machines, and airplanes are engineered nobility, lying well beyond most cars, boats, and motorcycles on the continuum of our shiny creations.

Many pilots, I think, are especially drawn to the freedom of flight. A jet is detached, physically remote and separate for a certain number of miles and hours. Such solitude is all but absent







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from the world now, and so—paradoxically, for in the cockpit we could hardly be better encased in technology—flight feels increasingly old-fashioned. Paired with this freedom is the opportunity to come to know the cities of the world well and to see so much of the land, water, and air that lie between them.

Then, too, there is the perennial yearning for height that many of us share. High places have gravity. They pull us up. Elevation remains simple, a prime number, an element on the periodic table. "Higher, Orville, higher!" cried the father of the Wright brothers, when he made his first flight at the age of eighty-one. We build skyscrapers and visit their observation decks; we ask for an upper floor in a hotel; we ponder photographs taken from high above our homes, our towns, our planet with a mix of love and bewildered recognition; we climb mountains and try if we can to save our sandwich for the summit. On my first morning in a new city I'll often go first to a viewing point on top of a tall building, where I occasionally see travelers whom I recognize from my flight.

Perhaps evolution alone explains the attraction of altitude. Here is the big picture, the survey, the overview, the lookout, the lay of our land, what approaches our cave or castle. Strabo, the Greek geographer who would partly inspire Columbus, climbed the acropolis of Corinth merely to gain perspective on the city. When my father arrived to work as a missionary in a poor neighborhood of the Brazilian metropolis of Salvador, his first step was to hire a pilot to help him photograph the unmapped neighborhood and its informal, largely unnamed streets. Many years later, after he died, my brother and I heard a rumor that a street in this locality had been named for him after he left Brazil. We pored over a map of the city on a laptop to find Rua Padre José Henrique, Father









Joseph Henry Street; we zoomed in from the digital sky, from four decades and many thousands of miles away, to remember the story of his first flight over this city.

But I think our love of height cannot be entirely explained by its many practical uses. In so many realms we seek evidence of interconnection, of parts that form a whole. In music, comedy, science, we respond to the revealing of relationships we did not see at first, or did not expect to find so pleasing. Flight is the cartographic, planetary equivalent of hearing a song covered by a singer you love, or meeting for the first time a relative whose features or mannerisms are already familiar. We know the song but not like this; we have never met this person and yet we have never in our lives been strangers. Airplanes raise us above the patterns of streets, forests, suburbs, schools, and rivers. The ordinary things we thought we knew become new or more beautiful, and the visible relationships between them on the land, particularly at night, hint at the circuitry of more or less everything.

I've occasionally toured cathedrals in faraway cities that have labyrinths, sinuous paths inlaid in the stone that you follow around and around, back and forth. I've been struck by the peacefulness of labyrinths, the intended result of being able to see your path, and the contrast such a gift makes with the barely relaxing experience of walking a maze, or even the aisles of a supermarket, where you cannot see the whole.

Even today many travelers leave home not just to see new places, but also to see the whole of the place they have left from the various kinds of distance—cultural, physical, linguistic—that travel opens for them. Indeed, a fascination with this perspective is something I associate with the most experienced travelers. Occasionally I fly to a city in which one of the attendants on my flight







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lives, or was born, and he or she is invariably eager to join us in the cockpit for takeoff or landing, in order to watch how the loved place, though it has no remaining mysteries, leaves the cockpit windows or comes to fill them again.

LIFT

I love flying, for all these reasons. But to me the joy of airliners is the particular quality of their motion over the world. When I run through the woods, over the ground, the branches are close, loud, fast. I am what's moving. Up and down, turning along the path, my feet never land twice at the same angle. I could stop to touch anything. In contrast, films taken of the earth from orbit show a wholly different kind of motion, a steady and weighty perfection of turning, an imperious stability that's the last thing we might expect from such unfathomable height and speed.

An airliner does not move at either of these extremes. In the course of each flight, however, it crosses much of the continuum between them. I love to fly because I love to watch the world go by. After takeoff we see the world just as we would from a small plane. Then in the high middle hours of a flight we perceive less detail, of course, but we also see a greater extent of the earth than we were surely ever meant to encounter at one time. And in some achingly stately inversion of our senses it's in the cruise, when we are highest and fastest, that place turns most deliberately. The connections below make the most sense to me from this abstracted, apparently slow motion above them. The connections are made as a matter of course, we might say, as a road or a river or a railway runs between two cities, and one landscape or cloudscape flows into another as easily as lines across a page. They also build over time, as the dimensions of a city, a country, or an ocean are summed by the minutes or hours such a place takes to cross the mind's eye.

Then we descend; we make our approach to another place. The







world accelerates as we return; it looks fastest just before landing, when the airplane is slowest. The wheels race at takeoff but are stilled in flight, and on touchdown they are sped up again by the earth. This touch turns the speed of flight to the speed of the wheels; the brakes turn this to the heat of home, of a journey's end, that is carried off on the wind.

A measure of longing is attached to any mode of travel, of course. By definition every traveler wishes, or needs, to be somewhere else. What is longed for may be the place you have just left. Or it may be a forest or cathedral or desert you have read about or imagined since childhood, or a place you have always wished to live, or a place you knew well when you were young. But flight, which takes us so far to or from what we love, embodies this longing most directly. The space through which the airplane moves is so alien. Humans can't breathe in it. We can't pull over halfway and silence the machine and stretch our legs; we can't swim in it or hold on to the side of the pool. The adversity of the sky sharply divides the journey from the times and places that lie at either end.

When travelers move between points on the globe so different in culture, language, and history—London, Tokyo—the imaginative distance can be as vast as the physical gap in the air above them. Like the music you love best, this mental distance feels partly external and partly your own. And so high above the world, open to more of the planet and sky than any species has the right to see, we find room for introspection in one of the last places we might have thought to look for it. When I was thirteen and got my first portable cassette player and headphones and began to choose music for myself, I asked my brother if pilots were allowed to listen to music while they flew. He answered that he wasn't sure, but he thought not. He was right. But as passengers we are all





given these increasingly rare quiet hours in which there is nowhere we have to go and nothing we have to do, hours in which we are alone with our thoughts and music and the moving picture of our journeys.

Then we blink and suddenly we see again the earth we are flying over. From the window seat our focal point crosses between the personal and the planetary so smoothly that such movement seems to hint at a new species of grace, that we would come to only in the sky. Whatever our idea of the sacred, our simplest questions—how the one relates to the many, how time equates to distance, how the present rests on the past as simply as our lights lie on each night's darkened sphere—are rarely framed as clearly as they are by the oval window of an airplane. We look through it, over snowcapped cordilleras in the last red turn of the day, or upon the shining night-palmistry of cities, and we see that the window is a mirror, briefly raised above the world.

The journey, of course, is not quite the destination. Not even for pilots. Still, we are lucky to live in an age in which many of us, on our busy way to wherever we are going, are given these hours in the high country, when lightness is lent to us, where the volume of our home is opened and a handful of our oldest words—journey, road, wing, water; earth and air, sky and night and city—are made new. From airplanes we occasionally look up and are briefly held by the stars or the firmament of blue. But mostly we look down, caught by the sudden gravity of what we've left, and by thoughts of reunion, drifting like clouds over the half-bright world.



