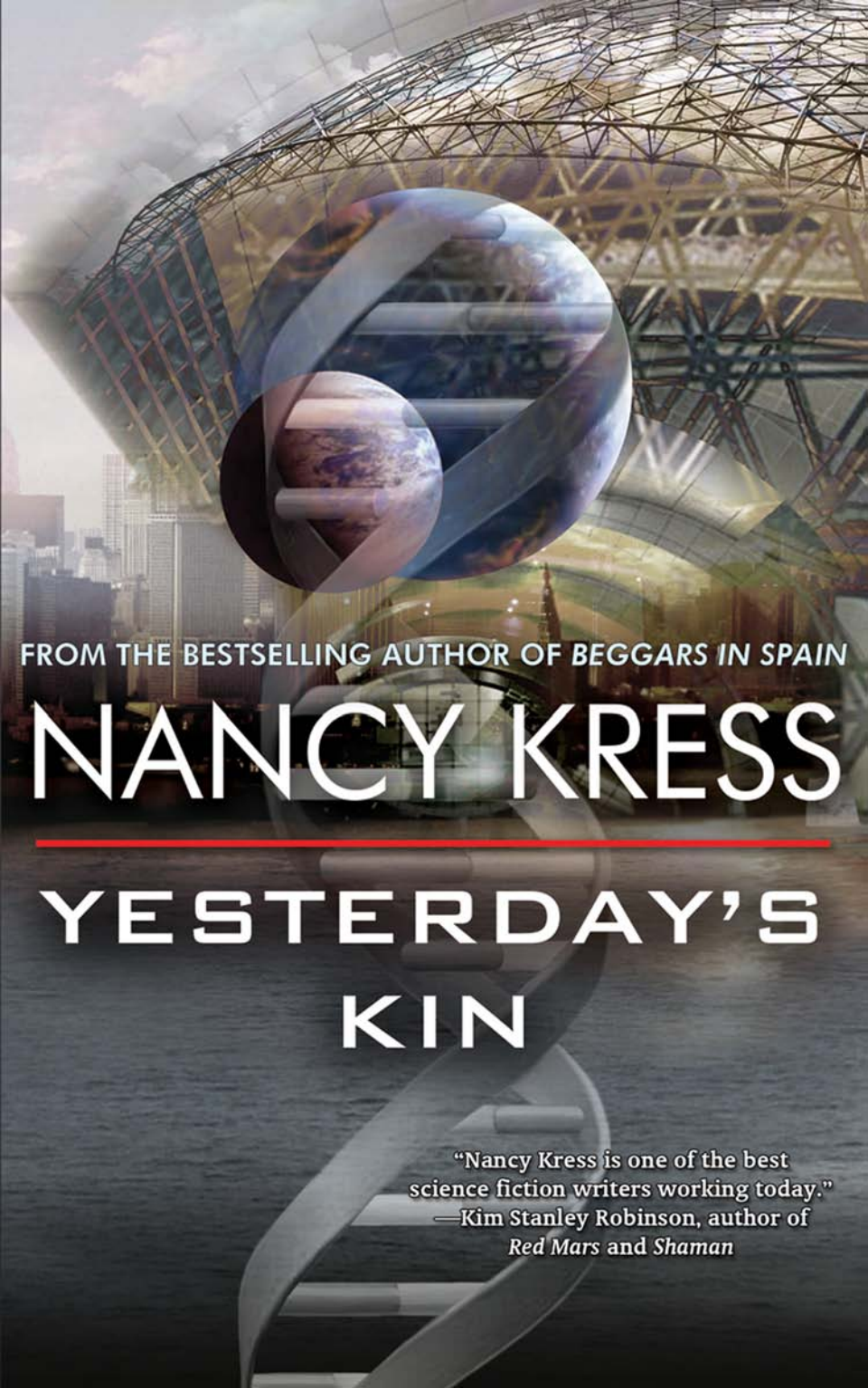
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—Jack McDevitt, author of *Infinity Beach* and *Echo*

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—Mary Robinette Kowal, author of *Shades of Milk and Honey*

YESTERDAY'S KIN

NANCY KRESS

Tachyon Publications
1459 18th Street #139
San Francisco, CA 94107
(415) 285-5615
tachyon@tachyonpublications.com

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NANCY KRESS

YESTERDAY'S KIN

TACHYON
SAN FRANCISCO

For Maura, my scientific advisor

"We see in these facts some deep organic bond, prevailing throughout space and time. . . . This bond, on my theory, is simple inheritance."

—Charles Darwin, *The Origin of Species*

I: S minus 10.5 months

MARIANNE

The publication party was held in the dean's office, which was supposed to be an honor. Oak-paneled room, sherry in little glasses, small-paned windows facing the quad—the room was trying hard to be a Commons someplace like Oxford or Cambridge, a task for which it was several centuries too late. The party was trying hard to look festive. Marianne's colleagues, except for Evan and the dean, were trying hard not to look too envious, or at their watches.

"Stop it," Evan said at her from behind the cover of his raised glass.

"Stop what?"

"Pretending you hate this."

"I hate this," Marianne said.

"You don't."

He was half right. She didn't like parties but she was proud of her paper, which had been achieved despite two years of gene sequencers that kept breaking down, inept graduate students who contaminated samples with their own DNA, murmurs of "Lucky find" from Baskell, with whom she'd never gotten along. Baskell, an old-guard physicist, saw her as a bitch who refused to defer to rank or back down gracefully in an argument. Many people, Marianne knew, saw her as some variant of this. The list included two of her three grown children.

Outside the open casements, students lounged on the grass in the mellow October sunshine. Three girls in cut-off jeans played Frisbee, leaping at the blue flying saucer and checking to see if the boys sitting on the stone wall were watching. Feinberg and Davidson, from Physics, walked by, arguing amiably. Marianne wished she were with them instead of at her own party.

"Oh God," she said to Evan, "Curtis just walked in."

The president of the university made his ponderous way across the room. Once he had been a historian, which might be why he reminded Marianne of Henry VIII. Now he was a campus politician, as power-mad as Henry but stuck at a second-rate university where there wasn't much power to be had. Marianne held against him not his personality but his mind; unlike Henry, he was not all that bright. And he spoke in clichés.

"Dr. Jenner," he said, "congratulations. A feather in your cap, and a credit to us all."

"Thank you, Dr. Curtis," Marianne said.

"Oh, 'Ed,' please."

"Ed." She didn't offer her own first name, curious to see if he remembered it. He didn't. Marianne sipped her sherry.

Evan jumped into the awkward silence. "I'm Dr. Blanford, visiting post-doc," he said in his plummy British accent. "We're all so proud of Marianne's work."

"Yes! And I'd love for you to explain to me your innovative process, ah, Marianne."

He didn't have a clue. His secretary had probably reminded him that he had to put in an appearance at the party: *Dean of Science's office, 4:30 Friday, in honor of that publication by Dr. Jenner in*—quick look at e-mail—*in* Nature, *very prestigious, none of our scientists has published there before*. . . .

"Oh," Marianne said as Evan poked her discreetly in the side: *Play nice!* "it wasn't so much an innovation in process as unexpected results from known procedures. My assistants and I discovered a new haplogroup of mitochondrial DNA. Previously it was thought that *Homo sapiens* consisted of thirty haplogroups, and we found a thirty-first."

"By sequencing a sample of contemporary genes, you know," Evan said helpfully. "Sequencing and verifying."

Anything said in upper-crust British automatically

sounded intelligent, and Dr. Curtis looked suitably impressed. "Of course, of course. Splendid results. A star in your crown."

"It's yet another haplogroup descended," Evan said with malicious helpfulness, "from humanity's common female ancestor 150,000 years ago. 'Mitochondrial Eve.'"

Dr. Curtis brightened. There had been a TV program about Mitochondrial Eve, Marianne remembered, featuring a buxom actress in a leopard-skin sarong. "Oh, yes! Wasn't that—"

"I'm sorry, you can't go in there!" someone shrilled in the corridor outside the room. All conversation ceased. Heads swiveled toward three men in dark suits pushing their way past the knot of graduate students by the door. The three men wore guns.

Another school shooting, Marianne thought, *where can I—*

"Dr. Marianne Jenner?" the tallest of the three men said, flashing a badge. "I'm Special Agent Douglas Katz of the FBI. We'd like you to come with us."

Marianne said, "Am I under arrest?"

"No, no, nothing like that. We are acting under direct order of the president of the United States. We're here to escort you to New York."

Evan had taken Marianne's hand—she wasn't sure just when. There was nothing romantic in the hand-clasp, nor anything sexual. Evan, twenty-five years her junior and discreetly gay, was a friend, an ally, the only other evolutionary biologist in the department

and the only one who shared Marianne's cynical sense of humor. *"Or so we thought,"* they said to each other whenever any hypothesis proved wrong. *Or so we thought*. . . . His fingers felt warm and reassuring around her suddenly icy ones.

"Why am I going to New York?"

"I'm afraid we can't tell you that. But it is a matter of national security."

"Me? What possible reason—?"

Special Agent Katz almost, but not quite, hid his impatience at her questions. "I wouldn't know, ma'am. My orders are to escort you to UN Special Mission Headquarters in Manhattan."

Marianne looked at her gaping colleagues, at the wide-eyed grad students, at Dr. Curtis, who was already figuring how this could be turned to the advantage of the university. She freed her hand from Evan's, and managed to keep her voice steady.

"Please excuse me, Dr. Curtis, Dean. It seems I'm needed for something connected with . . . with the aliens."

NOAH

One more time, Noah Jenner rattled the doorknob to the apartment. It felt greasy from too many unwashed palms, and it was still locked. But he knew that Emily was in there. That was the kind of thing

he was always, somehow, right about. He was right about things that didn't do him any good.

"Emily," he said softly through the door, "please open up."

Nothing.

"Emily, I have nowhere else to go."

Nothing.

"I'll stop, I promise. I won't do sugarcane ever again."

The door opened a crack, chain still in place, and Emily's despairing face appeared. She wasn't the kind of girl given to dramatic fury, but her quiet despair was even harder to bear. Not that Noah didn't deserve it. He knew he did. Her fair hair hung limply on either side of her long, sad face. She wore the green bathrobe he liked, with the butterfly embroidered on the left shoulder.

"You won't stop," Emily said. "You can't. You're an addict."

"It's not an addictive drug. You know that."

"Not physically, maybe. But it is for you. You won't give it up. I'll never know who you really are."

"I—"

"I'm sorry, Noah. But—go away." She closed and relocked the door.

Noah stood slumped against the dingy wall, waiting to see if anything else would happen. Nothing did. Eventually, as soon as he mustered the energy, he would have to go away.

Was she right? Would he never give up sugarcane?

It wasn't that it delivered a high: it didn't. No rush of dopamine, no psychedelic illusions, no out-of-body experiences, no lowering of inhibitions. It was just that on sugarcane, Noah felt like he was the person he was supposed to be. The problem was that it was never the same person twice. Sometimes he felt like a warrior, able to face and ruthlessly defeat anything. Sometimes he felt like a philosopher, deeply content to sit and ponder the universe. Sometimes he felt like a little child, dazzled by the newness of a fresh morning. Sometimes he felt like a father (he wasn't), protective of the entire world. Theories said that sugarcane released memories of past lives, or stimulated the collective unconscious, or made temporarily solid the images of dreams. One hypothesis was that it created a sort of temporary, self-induced Korsakoff's syndrome, the neurological disorder in which invented selves seem completely true. No one knew how sugarcane really acted on the brain. For some people, it did nothing at all. For Noah, who had never felt he fit in anywhere, it gave what he had never had: a sense of solid identity, if only for the hours that the drug stayed in his system.

The problem was, it was difficult to hold a job when one day you were nebbishy, sweet-natured Noah Jenner, the next day you were Attila the Hun, and two days later you were far too intellectual to wash dishes or make change at a convenience store. Emily had wanted Noah to hold a job. To contribute to the rent, to scrub the floor, to help take the sheets

to the laundromat. To be an adult, and the same adult every day. She was right to want that. Only—

He might be able to give up sugarcane and be the same adult, if only he had the vaguest idea who that adult was. Which brought him back to the same problem—he didn't fit anywhere. And never had.

Noah picked up the backpack in which Emily had put his few belongings. She couldn't have left it in the hallway for very long or the backpack would have already been stolen. He made his way down the three flights from Emily's walk-up and out onto the streets. The October sun shone warmly on his shoulders, on the blocks of shabby buildings, on the trash skirling across the dingy streets of New York's lower East Side. Walking, Noah reflected bitterly, was one thing he could do without fitting in. He walked blocks to Battery Park, that green oasis on the tip of Manhattan's steel canyons, leaned on a railing, and looked south.

He could just make out the *Embassy*, floating in New York Harbor. Well, no, not the *Embassy* itself, but the shimmer of light off its energy shield. Everybody wanted that energy shield, including his sister Elizabeth. It kept everything out, short of a nuclear missile. Maybe that, too: so far nobody had tried, although in the two months since the *Embassy* had floated there, three different terrorist groups had tried other weapons. Nothing got through the shield, although maybe air and light did. They must, right? Even aliens needed to breathe.

When the sun dropped below the horizon, the glint off the floating embassy disappeared. Dusk was gathering. He would have to make the call if he wanted a place to sleep tonight. Elizabeth or Ryan? His brother wouldn't yell at him as much, but Ryan lived upstate, in the same little Hudson River town as their mother's college, and Noah would have to hitchhike there. Also, Ryan was often away, doing field work for his wildlife agency. Noah didn't think he could cope with Ryan's talkative, sticky-sweet wife right now. So it would have to be Elizabeth.

He called his sister's number on his cheap cell. "Hello?" she snapped. *Born angry,* their mother always said of Elizabeth. Well, Elizabeth was in the right job, then.

"Lizzie, it's Noah."

"Noah."

"Yes. I need help. Can I stay with you tonight?" He held the cell away from his ear, bracing for her onslaught. *Shiftless, lazy, directionless*. . . . When it was over, he said, "Just for tonight."

They both knew he was lying, but Elizabeth said, "Come on then," and clicked off without saying good-bye.

If he'd had more than a few dollars in his pocket, Noah would have looked for a sugarcane dealer. Since he didn't, he left the park, the wind pricking at him now with tiny needles, and descended to the subway that would take him to Elizabeth's apartment on the upper West Side.

MARIANNE

The FBI politely declined to answer any of Marianne's questions. Politely, they confiscated her cell and iPad and took her in a sleek black car down Route 87 to New York, through the city to lower Manhattan, and out to a harbor pier. Gates with armed guards controlled access to a heavily fortified building at the end of the pier. Politely, she was searched and fingerprinted. Then she was politely asked to wait in a small windowless room equipped with a few comfortable chairs, a table with coffee and cookies, and a wall-mounted TV tuned to CNN. A news show was covering weather in Florida.

The aliens had shown up four months ago, their ship barreling out from the direction of the sun, which had made it harder to detect until a few weeks before arrival. At first, in fact, the ship had been mistaken for an asteroid and there had been panic that it would hit Earth. When it was announced that the asteroid was in fact an alien vessel, panic had decreased in some quarters and increased in others. A ship? Aliens? Armed forces across the world mobilized. Communications strategies were formed, and immediately hacked by the curious and technologically sophisticated. Seven different religions declared the end of the world. The stock

and bond markets crashed, rallied, soared, crashed again, and generally behaved like a reed buffeted by a hurricane. Governments put the world's top linguists, biologists, mathematicians, astronomers, and physicists on top-priority standby. Psychics blossomed. People rejoiced and feared and prayed and committed suicide and sent up balloons in the general direction of the moon, where the alien ship eventually parked itself in orbit.

Contact was immediate, in robotic voices that were clearly mechanical, and in halting English that improved almost immediately. The aliens, dubbed by the press "Denebs" because their ship came from the general direction of that bright, blue-white star, were friendly. The xenophiles looked smugly triumphant. The xenophobes disbelieved the friendliness and bided their time. The aliens spent two months talking to the United Nations. They were reassuring; this was a peace mission. They were also reticent. Voice communication only, and through machines. They would not show themselves: "Not now. We wait." They would not visit the International Space Station, nor permit humans to visit their ship. They identified their planet, and astronomers found it once they knew where to look, by the faintly eclipsed light from its orange-dwarf star. The planet was in the star's habitable zone, slightly larger than Earth but less dense, water present. It was nowhere near Deneb, but the name stuck.

After two months, the aliens requested permission

to build what they called an embassy, a floating pavilion, in New York Harbor. It would be heavily shielded and would not affect the environment. In exchange, they would share the physics behind their star drive, although not the engineering, with Earth, via the Internet. The UN went into furious debate. Physicists salivated. Riots erupted, pro and con, in major cities across the globe. Conspiracy theorists, some consisting of entire governments, vowed to attack any Deneb presence on Earth.

The UN finally agreed, and the structure went into orbit around Earth, landed without a splash in the harbor, and floated peacefully offshore. After landing, it grew wider and flatter, a half-dome that could be considered either an island or a ship. The U.S. government decided it was a ship, subject to maritime law, and the media began capitalizing and italicizing it: the *Embassy*. Coast Guard craft circled it endlessly; the U.S. Navy had ships and submarines nearby. Airspace above was a no-fly zone, which was inconvenient for jets landing at New York's three big airports. Fighter jets nearby stayed on high alert.

Nothing happened.

For another two months the aliens continued to talk through their machines to the UN, and only to the UN, and nobody ever saw them. It wasn't known whether they were shielding themselves from Earth's air, microbes, or armies. The *Embassy* was surveilled by all possible means. If anybody learned anything,

the information was classified except for a single exchange:

Why are you here?

To make contact with humanity. A peace mission.

A musician set the repeated phrases to music, a sly and humorous refrain, without menace. The song, an instant international sensation, was the opening for playfulness about the aliens. Late-night comics built monologues around supposed alien practices. The *Embassy* became a tourist attraction, viewed through telescopes, from boats outside the Coast Guard limit, from helicopters outside the no-fly zone. A German fashion designer scored an enormous runway hit with "the Deneb look," despite the fact that no one knew how the Denebs looked. The stock market stabilized as much as it ever did. Quickie movies were shot, some with Deneb allies and some with treacherous Deneb foes who wanted our women or gold or bombs. Bumper stickers proliferated like kudzu: I BRAKE FOR DENEBS. EARTH IS FULL ALREADY—GO HOME. DENEBS DO IT INVISIBLY. WILL TRADE PHYSICS FOR FOOD.

The aliens never commented on any of it. They published the promised physics, which only a few dozen people in the world could understand. They were courteous, repetitive, elusive. *Why are you here? To make contact with humanity. A peace mission.*

Marianne stared at the TV, where CNN showed footage of disabled children choosing Halloween

costumes. Nothing about the discussion, the room, the situation felt real. Why would the aliens want to talk to her? It had to be about her paper, nothing else made sense. No, that didn't make sense either.

"—donated by a network of churches from five states. Four-year-old Amy seizes eagerly on the black-cat costume, while her friend Kayla chooses—"

Her paper was one of dozens published every year on evolutionary genetics, each paper adding another tiny increment to statistical data on the subject. Why this one? Why her? The UN Secretary-General, various presidents and premiers, top scientists—the press said they all talked to the Denebs from this modern fortress, through (pick one) highly encrypted devices that permitted no visuals, or one-way visuals, or two-way visuals that the UN was keeping secret, or not at all and the whole alien-human conversation was invented. The *Embassy*, however, was certainly real. Images of it appeared on magazine covers, coffee mugs, screen savers, tee shirts, paintings on velvet, targets for shooting ranges.

Marianne's daughter Elizabeth regarded the aliens with suspicion, but then, Elizabeth regarded everyone with suspicion. It was one reason she was the youngest Border Patrol section leader in the country, serving on the New York Task Force along with several other agencies. She fit right in with the current American obsession with isolationism as an economic survival strategy.

Ryan seldom mentioned the aliens. He was too absorbed in his career and his wife.

And Noah—did Noah, her problem child, even realize the aliens were here? Marianne hadn't seen Noah in months. In the spring he had gone to "try life in the South." An occasional e-mail turned up on her phone, never containing much actual information. If Noah was back in New York, he hadn't called her yet. Marianne didn't want to admit what a relief that was. Her child, her baby—but every time they saw each other, it ended in recriminations or tears.

And what was she doing, thinking about her children instead of the aliens? Why did the ambassador want to talk to her? Why were the Denebs here?

To make contact with humanity. A peace mission. . . .

"Dr. Jenner?"

"Yes." She stood up from her chair, her jaw set. Somebody better give her some answers, now.

The young man looked doubtfully at her clothes, dark jeans and a green suede blazer ten years old, her standard outfit for faculty parties. He said, "Secretary Desai will join you shortly."

Marianne tried to let her face show nothing. A few moments later Vihaan Desai, Secretary-General of the United Nations, entered the room, followed by a security detail. Tall, elderly, he wore a sky-blue kurta of heavy, richly embroidered silk. Marianne felt like a wren beside a peacock. Desai held out his hand but did not smile. Relations between the United States and India were not good. Relations between

the United States and everybody were not good, as the country relentlessly pursued its new policy of economic isolationism in an attempt to protect jobs. Until the Denebs came, with their cosmos-shaking distraction, the UN had been thick with international threats. Maybe it still was.

"Dr. Jenner," Desai said, studying her intently, "it seems we are both summoned to an interstellar conference." His English, in the musical Indian accent, was perfect. Marianne remembered that he spoke four languages.

She said, "Do you know why?"

Her directness made him blink. "I do not. The Deneb ambassador was insistent but not forthcoming."

And does humanity do whatever the ambassador insists on? Marianne did not say this aloud. Something here was not adding up. The Secretary-General's next words stunned her.

"We, plus a few others, are invited aboard the *Embassy*. The invitation is dependent upon your presence, and upon its immediate acceptance."

"Aboard . . . aboard the *Embassy*?"

"It seems so."

"But nobody has ever—"

"I am well aware of that." The dark, intelligent eyes never left her face. "We await only the other guests who happen to be in New York."

"I see." She didn't.

Desai turned to his security detail and spoke to them in Hindi. An argument began. Did security

usually argue with their protectees? Marianne wouldn't have thought so, but then, what did she know about UN protocol? She was out of her field, her league, her solar system. Her guess was that the Denebs were not allowing bodyguards aboard the *Embassy*, and that the security chief was protesting.

Evidently the Secretary-General won. He said to her, "Please come," and walked with long strides from the room. His kurta rustled at his ankles, shimmering sky. Not intuitive, Marianne could nonetheless sense the tension coming off him like heat. They went down a long corridor, trailed by deeply frowning guards, and down an elevator. Very far down—did the elevator go under the harbor? It must. They exited into a small room already occupied by two people, a man and a woman. Marianne recognized the woman: Ekaterina Zaytsev, the representative to the UN from the Russian Federation. The man might be the Chinese representative. Both looked agitated.

Desai said in English, "We await only—ah, here they are."

Two much younger men practically blew into the room, clutching headsets. Translators. They looked disheveled and frightened, which made Marianne feel better. She wasn't the only one battling an almost overwhelming sense of unreality. If only Evan could be here, with his sardonic and unflappable Britishness. *"Or so we thought. . . ."*

No. Neither she nor Evan had ever thought of this.

"The other permanent members of the Security Council are unfortunately not immediately available," Desai said. "We will not wait."

Marianne couldn't remember who the other permanent members were. The UK, surely, but who else? How many? What were they doing this October dusk that would make them miss first contact with an alien species? Whatever it was, they had to regret it the rest of their lives.

Unless, of course, this little delegation never returned—killed or kidnapped or eaten. No, that was ridiculous. She was being hysterical. Desai would not go if there were danger.

Of course he would. Anyone would. Wouldn't they? Wouldn't she? Nobody, she suddenly realized, had actually asked her to go on this mission. She'd been ordered to go. What if she flat-out refused?

A door opened at the far end of the small room, voices spoke from the air about clearance and proceeding, and then another elevator. The six people stepped into what had to be the world's most comfortable and unwarlike submarine, equipped with lounge chairs and gold-braided officers.

A submarine. Well, that made sense, if plans had been put in place to get to the *Embassy* unobserved by press, tourists, and nut jobs who would blow up the alien base if they could. The Denebs must have agreed to some sort of landing place or entryway, which meant this meeting had been talked of, planned for, long before today. Today was just the

moment the aliens had decided to put the plan into practice. Why? Why so hastily?

"Dr. Jenner," Desai said, "in the short time we have here, please explain your scientific findings to us."

None of them sat in the lounge chairs. They stood in a circle around Marianne, who felt none of the desire to toy with them as she had with Dr. Curtis at the college. Where were her words going, besides this cramped, luxurious submarine? Was the president of the United States listening, packed into the situation room with whoever else belonged there?

"My paper is nothing startling, Mr. Secretary-General, which is why this is all baffling to me. In simple terms—" she tried to not be distracted by the murmuring of the two translators into their mouthpieces "—all humans alive today are the descendants of one woman who lived about 150,000 years ago. We know this because of mitochondrial DNA, which is not the DNA from the nucleus of the cell but separate DNA found in small organelles called mitochondria. Mitochondria, which exist in every cell of your body, are the powerhouses of the cell, producing energy for cellular functions. Mitochondrial DNA does not undergo recombination and is not found in a sperm cell after it reaches the egg. So the mitochondrial DNA is passed down unchanged from a mother to all her children."

Marianne paused, wondering how to explain this simply, but without condescension. "Mitochondrial

DNA mutates at a steady rate, about one mutation every 10,000 years in a section called 'the control region,' and about once every 3,500 years in the mitochondrial DNA as a whole. By tracing the number and type of mutations in contemporary humans, we can construct a tree of descent: which group descended from which female ancestor.

"Evolutionary biologists have identified thirty of these haplogroups. I found a new one, L7, by sequencing and comparing DNA samples with a standard human mitochondrial sample, known as the revised Cambridge Reference Sequence."

"How did you know where to look for this new group?"

"I didn't. I came across the first sample by chance and then sampled her relatives."

"Is it very different, then, from the others?"

"No," Marianne said. "It's just a branch of the L haplogroup."

"Why wasn't it discovered before?"

"It seems to be rare. The line must have mostly died out over time. It's a very old line, one of the first divergences from Mitochondrial Eve."

"So there is nothing remarkable about your finding?"

"Not in the least. There may even be more haplogroups out there that we just haven't discovered yet." She felt a perfect fool. They all looked at her as if expecting answers—Look! A blinding scientific light illuminate all!—and she had none. She was a

workman scientist who had delivered a workmanlike job of fairly routine haplotyping.

"Sir, we have arrived," said a junior officer. Marianne saw that his dress blues were buttoned wrong. They must have been donned in great haste. The tiny, human mishap made her feel better.

Desai drew a deep, audible breath. Even he, who had lived through war and revolution, was nervous. Commands flew through the air from invisible people. The submarine door opened.

Marianne stepped out into the alien ship.

NOAH

"Where's Mom? Did you call her?" Elizabeth demanded.

"Not yet," Noah said.

"Does she even know you're in New York?"

"Not yet." He wanted to tell his sister to stop hammering at him, but he was her guest and so he couldn't. Not that he'd ever been able to stand up to either of his siblings. His usual ploy had been to get them battering on each other and leave him alone. Maybe he could do that now. Or maybe not.

"Noah, how long have you been in the city?"

"A while."

"How long a while?"

Noah put his hand in front of his face. "Lizzie, I'm

really hungry. I didn't eat today. Do you think you could—"

"Don't start your whining-and-helpless routine with me, Noah. It doesn't work anymore."

Had it ever? Noah didn't think so, not with Elizabeth. He tried to pull himself together. "Elizabeth, I haven't called Mom yet and I *am* hungry. Please, could we defer this fight until I eat something? Anything, crackers or toast or—"

"There's sandwich stuff in the fridge. Help yourself. I'm going to call Mom, since at least one of us should let her know the prodigal son has deigned to turn up again. She's been out of her mind with worry about you."

Noah doubted that. His mother was the strongest person he knew, followed by Elizabeth and Ryan. Together, the three could have toppled empires. Of course, they seldom were together, since they fought almost every time they met. Odd that they would go on meeting so often, when it produced such bitterness, and all over such inconsequential things. Politics, religion, funding for the arts, isolationism. . . . He rummaged in Elizabeth's messy refrigerator, full of plastic containers with their lids half off, some with dabs of rotting food stuck to the bottom. God, this one was growing *mold*. But he found bread, cheese, and some salsa that seemed all right.

Elizabeth's one-bedroom apartment echoed her fridge, which was another reason she and Mom fought. Unmade bed, dusty stacks of journals and

newspapers, a vase of dead flowers probably sent by one of the boyfriends Elizabeth never fell in love with. Mom's house north of the city, and Ryan and Connie's near hers, were neat and bright. Housecleaners came weekly; food was bought from careful lists; possessions were replaced whenever they got shabby. Noah had no possessions, or at least as few as he could manage.

Elizabeth clutched the phone. She dressed like a female FBI agent—short hair, dark pantsuit, no make-up—and was beautiful without trying. "Come on, Mom, pick up," she muttered, "it's a cell, it's supposed to be portable."

"Maybe she's in class," Noah said. "Or a meeting."

"It's Friday night, Noah."

"Oh. Yeah."

"I'll try the landline. She still has one."

Someone answered the landline on the first ring; Noah heard the chime stop from where he sat munching his sandwich. Then silence.

"Hello? Hello? Mom?" Elizabeth said.

The receiver on the other end clicked.

"That's odd," Elizabeth said.

"You probably got a wrong number."

"Don't talk with your mouth full. I'm going to try again."

This time no one answered. Elizabeth scowled. "I don't like that. Someone is there. I'm going to call Ryan."

Wasn't Ryan somewhere in Canada doing field

work? Or maybe Noah had the dates wrong. He'd only glanced at the e-mail from Ryan, accessed on a terminal at the public library. That day he'd been on sugarcane, and the temporary identity had been impatient and brusque.

"Ryan? This is Elizabeth. Do you know where Mom is? . . . If I knew her schedule I wouldn't be calling, would I? . . . Wait, wait, will you *listen* for a minute? I called her house and someone picked up and then clicked off, and when I called back a second later, it just rang. Will you go over there just to check it out? . . . Okay, yes, we'll wait. Oh, Noah's here. . . . No, I'm not going to discuss with you right now the . . . *Ryan*. For chrissake, go check Mom's house!" She clicked off.

Noah wished he were someplace else. He wished he were somebody else. He wished he had some sugarcane.

Elizabeth flounced into a chair and picked up a book. *Tariffs, Borders, and the Survival of the United States*, Noah read upside-down. Elizabeth was a passionate defender of isolationism. How many desperate people trying to crash the United States borders had she arrested today? Noah didn't want to think about it.

Fifteen minutes later, Ryan called back. Elizabeth put the call on speaker phone. "Liz, there are cop cars around Mom's house. They wouldn't let me in. A guy came out and said Mom isn't dead or hurt or in trouble, and he couldn't tell me any more than that."

"Okay." Elizabeth wore her focused look, the one with which she directed border patrols. "I'll try the college."

"I did. I reached Evan. He said that three men claiming to be FBI came and escorted her to the UN Special Mission Headquarters in Manhattan."

"That doesn't make sense!"

"I know. Listen, I'm coming over to your place."

"I'm calling the police."

"No! Don't! Not until I get there and we decide what to do."

Noah listened to them argue, which went on until Ryan hung up. Of course Elizabeth, who worked for a quasi-military organization, wanted to call the cops. Of course Ryan, who worked for a wildlife organization that thought the government had completely messed up regulations on invasive botanical species, would shun the cops. Meanwhile Mom was probably just doing something connected with her college, a UN fundraiser or something, and that geek Evan had gotten it all wrong. Noah didn't like Evan, who was only a few years older than he was. Evan was everything that Noah's family thought Noah should be: smart, smooth, able to fit in anyplace, even into a country that wasn't his own. And how come Elizabeth's border patrols hadn't kept out Evan Blanford?

Never mind; Noah knew the answer.

He said, "Can I do anything?"

Elizabeth didn't even answer him.

MARIANNE

She had seen many pictures of the *Embassy*. From the outside, the floating pavilion was beautiful in a stark sort of way. Hemispherical, multifaceted like a buckyball (Had the Denebs learned that structure from humans or was it a mathematical universal?), the *Embassy* floated on a broad platform of some unknowable material. Facets and platform were blue but coated with the energy shield, which reflected sunlight so much that it glinted, a beacon of sorts. The aliens had certainly not tried to mask their presence. But there must be hidden machinery underneath, in the part known (maybe) only to Navy divers, since the entire huge structure had landed without a splash in the harbor. Plus, of course, the hidden passage through which the sub had come, presumably entailing a momentary interruption of the energy shield. Marianne knew she'd never find out the details.

The room into which she and the others stepped from the submarine was featureless except for the bed of water upon which their sub floated, droplets sliding off its sleek sides. No windows or furniture, one door. A strange smell permeated the air: Disinfectant? Perfume? Alien body odor? Marianne's heart began to beat oddly, too hard and

too loud, with abrupt painful skips. Her breathing quickened.

The door opened and a Deneb came out. At first, she couldn't see it clearly; it was clouded by the same glittery energy shield that covered the *Embassy*. When her eyes adjusted, she gasped. The others also made sounds: a quick indrawn breath, a clicking of the tongue, what sounded like an actual whimper. The Russian translator whispered, *"Bozhe moi!"*

The alien looked almost human. Almost, not quite. Tall, maybe six-two, the man—it was clearly male—had long, thin arms and legs, a deep chest, and a human face but much larger eyes. His skin was coppery and his hair, long and tied back, was dark brown. Most striking were his eyes: larger than humans', with huge dark pupils in a large expanse of white. He wore dark-green clothing, a simple tunic top over loose, short trousers that exposed his spindly calves. His feet were bare, and perhaps the biggest shock of all was his feet, five-toed and broad, the nails cut short and square. Those feet looked so much like hers that she thought wildly: *He could wear my shoes*.

"Hello," the alien said, and it was not his voice but the mechanical one of the radio broadcasts, coming from the ceiling.

"Hello," Desai said, and bowed from the waist. "We are glad to finally meet. I am Secretary-General Desai of the United Nations."

"Yes," the alien "said," and then added some

trilling and clicking sounds. His mouth did actually move. Immediately the ceiling said, "I welcome you in our own language."

Secretary Desai made the rest of the introductions with admirable calm. Marianne tried to fight her growing sense of unreality by recalling what she had read about the Denebs' planet. She wished she paid more attention to the astronomy. The popular press had said that the alien star was a K-something (K zero? K two? She couldn't remember). The alien home world had both less gravity and less light than Earth, at different wavelengths . . . orange, yes. The sun was an orange dwarf. Was this Deneb so tall because the gravity was less? Or maybe he was just a basketball player—

Get a grip, Marianne.

She did. The alien had said his name, an impossible collection of trilled phonemes, and immediately said, "Call me Ambassador Smith." How had he chosen that—from a computer-generated list of English names? When Marianne had been in Beijing to give a paper, some Chinese translators had done that: "Call me Dan." She had assumed the translators doubted her ability to pronounce their actual names correctly, and they had probably been right. But "Smith" for a starfarer. . . .

"You are Dr. Jenner?"

"Yes, Ambassador."

"We wanted to talk with you, in particular. Will you please come this way, all of you?"

They did, trailing like baby ducklings after the tall alien. The room beyond the single door had been fitted up like the waiting room of a very expensive medical specialist. Did they order the upholstered chairs and patterned rug on the Internet? Or manufacture them with some advanced nanotech deep in the bowels of the *Embassy*? The wall pictures were of famous skylines: New York, Shanghai, Dubai, Paris. Nothing in the room suggested alienness. Deliberate? Of course it was. *Nobody here but us chickens*.

Marianne sat, digging the nails of one hand into the palm of the other to quiet her insane desire to giggle.

"I would like to know of your recent publication, Dr. Jenner," the ceiling said, while Ambassador Smith looked at her from his disconcertingly large eyes.

"Certainly," Marianne said, wondering where to begin. Where to begin? How much did they know about human genetics?

Quite a lot, as it turned out. For the next twenty minutes Marianne explained, gestured, answered questions. The others listened silently except for the low murmur of the Chinese and Russian translators. Everyone, human and alien, looked attentive and courteous, although Marianne detected the slightly pursed lips of Ekaterina Zaytsev's envy.

Slowly it became clear that Smith already knew much of what Marianne was saying. His questions centered on where she had gotten her DNA samples.

"They were volunteers," Marianne said. "Collection

booths were set up in an open-air market in India, because I happened to have a colleague working there, in a train station in London, and on my college campus in the United States. At each place, a nominal fee was paid for a quick scraping of tissue from the inside of the cheek. After we found the first L7 DNA in a sample from an American student from Indiana, we went to her relatives to ask for samples. They were very cooperative."

"This L7 sample, according to your paper, comes from a mutation that marks the strain of one of the oldest of mitochondrial groups."

Desai made a quick, startled shift on his chair.

"That's right," Marianne said. "Evidence says that 'Mitochondrial Eve' had at least two daughters, and the line of one of them was L0, whereas the other line developed a mutation that became—" All at once she saw it, what Desai had already realized. She blinked at Smith and felt her mouth fall open, just as if she had no control over her jaw muscles, just as if the universe had been turned inside out, like a sock.

NOAH

An hour later, Ryan arrived at Elizabeth's apartment. Repeated calls to their mother's cell and landline had produced nothing. Ryan and Elizabeth sat on the sagging sofa, conferring quietly, their usual

belligerence with each other replaced by shared concern. Noah sat across the room, listening.

His brother had been short-changed in the looks department. Elizabeth was beautiful in a severe way and Noah knew he'd gotten the best of his parents' genes: his dead father's height and athletic build, his mother's light-gray eyes flecked with gold. In contrast, Ryan was built like a fire hydrant: short, muscular, thickening into cylindricalness since his marriage; Connie was a good cook. At thirty, he was already balding. Ryan was smart, slow to change, humorless.

Elizabeth said, "Tell me exactly what Evan said about the FBI taking her away. Word for word."

Ryan did, adding, "What about this—we call the FBI and ask them directly where she is and what's going on."

"I tried that. The local field office said they didn't know anything about it, but they'd make inquiries and get back to me. They haven't."

"Of course not. We have to give them a reason to give out information, and on the way over I thought of two. We can say either that we're going to the press, or that we need to reach her for a medical emergency."

Elizabeth said, "I don't like the idea of threatening the feds—too potentially messy. The medical emergency might be better. We could say Connie's developed a problem with her pregnancy. First grandchild, life-threatening complications—"

Noah, startled, said, "Connie's pregnant?"

"Four months," Ryan said. "If you ever read the e-mails everybody sends you, you might have gotten the news. You're going to be an uncle." His gaze said that Noah would make just as rotten an uncle as he did a son.

Elizabeth said, "You need to make the phone call, Ryan. You're the prospective father."

Ryan pulled out his cell, which looked as if it could contact deep space. The FBI office was closed. He left a message. FBI headquarters in D.C. was also closed. He left another message. Before Ryan could say, "They'll never get back to us" and so begin another argument with Elizabeth over governmental inefficiency, Noah said, "Did the Wildlife Society give you that cell for your job?"

"It's the International Wildlife Federation and yes, the phone has top-priority connections for the loosestrife invasion."

Noah ducked his head to hide his grin.

Elizabeth guffawed. "Ryan, do you know how pretentious that sounds? An emergency hotline for weeds?"

"Do you know how ignorant *you* sound? Purple loosestrife is taking over wetlands, which for your information are the most biologically diverse and productive ecologies on Earth. They're being choked by this invasive species, with an economic impact of millions of dollars that—"

"As if you cared about the United States economy!

You'd open us up again to competition from cheap foreign sweatshop labor, just let American jobs go to—"

"You can't shut out the world, Elizabeth, not even if you get the aliens to give you the tech for their energy shields. I know that's what you 'border-defense' types want—"

"Yes, it is! Our economic survival is at stake, which makes border patrol a lot more important than a bunch of creeping flowers!"

"Great, just great. Wall us off by keeping out new blood, new ideas, new trade partners. But let in invasive botanicals that encroach on farmland, so that eventually we can't even feed everyone who would be imprisoned in your imported alien energy fields."

"Protected, not imprisoned. The way we're protecting you now by keeping the Denebs offshore."

"Oh, you're doing that, are you? That was the aliens' decision. Do you think that if they had wanted to plop their pavilion in the middle of Times Square that your Border Patrol could have stopped them? They're a starfaring race, for chrissake!"

"Nobody said the—"

Noah shouted, which was the only way to get their attention, "Elizabeth, your cell is ringing! It says it's Mom!"

They both stared at the cell as if at a bomb, and then Elizabeth lunged for the phone. "Mom?"

"It's me. You called but—"

"Where have you been? What happened? What was the FBI—"

"I'll tell you everything. Are you and Ryan still at your place?"

"Yes. You sound funny. Are you sure you're okay?"

"Yes. No. Stay there, I'll get a cab, but it may be a few hours yet."

"But where—"

The phone went dead. Ryan and Elizabeth stared at each other. Into the silence, Noah said, "Oh yeah, Mom. Noah's here, too."

MARIANNE

"You are surprised," Ambassador Smith had said, unnecessarily.

Courtesy had been swamped in shock. "You're *human*? From Earth?"

"Yes. We think so."

"Your mitochondrial DNA matches the L7 sequence? No, wait—your whole biology matches ours?"

"There are some differences, of course. We—"

The Russian delegate stood up so quickly her chair fell over. She spat something which her translator gave as a milder, "'I do not understand how this is possible.'"

"I will explain," Smith said. "Please sit down."

Ekaterina Zaytsev did not sit. All at once Marianne wondered if the energy field enveloping Smith was weaponized.

Smith said, "We have known for millennia that we did not originate on World. There is no fossil record of us going back more than 150,000 Earth years. The life-forms native to World are DNA-based, but there is no direct genetic link. We know that someone took us from somewhere else and—"

"Why?" Marianne blurted. "Why would they do that? And who is 'they'?"

Before Smith could answer, Zaytsev said, "Why should your planet's native life-forms be DNA-based at all? If this story is not a collection of lies?"

"Panspermia," Smith said. "And we don't know why we were seeded from Earth to World. An experiment, perhaps, by a race now gone. We—"

The Chinese ambassador was murmuring to his translator. The translator, American and too upset to observe protocol, interrupted Smith.

"Mr. Zhu asks how, if you are from Earth, you progressed to space travel so much faster than we have? If your brains are the same as ours?"

"Our evolution was different."

Marianne darted in with, "How? Why? A hundred fifty thousand years is not enough for more than superficial evolutionary changes!"

"Which we have," Smith said, still in that mechanical voice that Marianne suddenly hated. Its very detachment sounded condescending. "World's

gravity, for instance, is one-tenth less than Earth's, and our internal organs and skeletons have adjusted. World is warmer than Earth, and you can see that we carry little body fat. Our eyes are much larger than yours—we need to gather all the light we can on a planet dimmer than yours. Most plants on World are dark, to gather as many photons as possible. We are dazzled by the colors on Earth."

He smiled, and Marianne remembered that all human cultures share certain facial expressions: happiness, disgust, anger.

Smith continued, "But when I said that our evolution differed from yours, I was referring to social evolution. World is a more benign planet than Earth. Little axial tilt, many easy-to-domesticate grains, much food, few predators. We had no Ice Age. We settled into agriculture over a hundred thousand years before you did."

Over a hundred thousand years more of settled communities, of cities, with their greater specialization and intellectual cross-fertilization. While Marianne's ancestors fifteen thousand years ago had still been hunting mastodons and gathering berries, these cousins across the galaxy might have been exploring quantum physics. But—

She said, "Then with such an environment, you must have had an overpopulation problem. All easy ecological niches rapidly become overpopulated!"

"Yes. But we had one more advantage." Smith paused; he was giving the translators time to catch

up, and she guessed what that meant even before he spoke again.

"The group of us seeded on World—and we estimate it was no more than a thousand—were all closely related. Most likely they were all brought from one place. Our gene pool does not show as much diversity as yours. More important, the exiles—or at least a large number of them—happened to be unusually mild-natured and cooperative. You might say, 'sensitive to other's suffering.' We have had wars, but not very many, and not early on. We were able to control the population problem, once we saw it coming, with voluntary measures. And, of course, those subgroups that worked together best made the earliest scientific advances and flourished most."

"You replaced evolution of the fittest with evolution of the most cooperative," Marianne said, and thought: *There goes Dawkins*.

"You may say that."

"I not say this," Zaytsev said, without waiting for her translator. Her face twisted. "How you know you come from Earth? And how know where is Earth?"

"Whoever took us to World left titanium tablets, practically indestructible, with diagrams. Eventually we learned enough astronomy to interpret them."

Moses on the mountain, Marianne thought. *How conveniently neat!* Profound distrust swamped her, followed by profound belief. Because, after all, here the aliens were, having arrived in a starship, and they certainly looked human. Although—

She said abruptly, "Will you give us blood samples? Tissue? Permit medical scans?"

"Yes."

The agreement was given so simply, so completely, that everyone fell silent. Marianne's dazed mind tried to find the scam in this, this possible nefarious treachery, and failed. It was quiet Zhu Feng who, through his translator, finally broke the silence.

"Tell us, please, honored envoy, why you are here at all?"

Again Smith answered simply. "To save you all from destruction."

NOAH

Noah slipped out of the apartment, feeling terrible but not terrible enough to stay. First transgression: If Mom returned earlier than she'd said, he wouldn't be there when she arrived. Second transgression: He'd taken twenty dollars from Elizabeth's purse. Third transgression: He was going to buy sugarcane.

But he'd left Elizabeth and Ryan arguing yet again about isolationism, the same argument in the same words as when he'd seen them last, four months ago. Elizabeth pulled out statistics showing that the United States' only option for survival, including avoiding revolution, was to retain and regain jobs within its borders, impose huge tariffs on imports, and rebuild

infrastructure. Ryan trotted out different statistics proving that only globalization could, after a period of disruption, bring economic benefits in the long run, including a fresh flow of workers into a graying America. They had gotten to the point of hurtling words like "Fascist" and "sloppy thinker" when Noah left.

He walked the three blocks to Broadway. It was, as always, brightly lit, but the gyro places and electronics shops and restaurants, their outside tables empty and chained in the cold dusk, looked shabbier than he remembered. Some stores were not just shielded by grills but boarded up. He kept walking east, toward Central Park.

The dealer huddled in a doorway. He wasn't more than fifteen. Sugarcane was a low-cost, low-profit drug, not worth the gangs' time, let alone that of organized crime. The kid was a freelance amateur, and God knows what the sugarcane was cut with.

Noah bought it anyway. In the nearest Greek place he bought a gyro as the price of the key to the bathroom and locked himself in. The room was windowless but surprisingly clean. The testing set that Noah carried everywhere showed him the unexpected: the sugarcane was cut only with actual sugar, and only by about fifty percent.

"Thank you, Lord," he said to the toilet, snorted twice his usual dose, and went back to his table to eat the cooling gyro and wait.

The drug took him quickly, as it always did. First

came a smooth feeling, as if the synapses of his brain were filling with rich, thick cream. Then: One moment he was Noah Jenner, misfit, and the next he wasn't. He felt like a prosperous small businessman of some type, a shop-owner maybe, financially secure and blissfully uncomplicated. A contented, centered person who never questioned who he was or where he was going, who fit in wherever he happened to be. The sort of man who could eat his gyro and gaze out the window without a confusing thought in his head.

Which he did, munching away, the juicy meat and mild spices satisfying in his mouth, for a quiet half-hour.

Except—something was happening on the street.

A group of people streamed down Broadway. A parade. No, a mob. They carried torches, of all things, and something larger on fire, carried high. . . . Now Noah could hear shouting. The thing carried high was an effigy made of straw and rags, looking like the alien in a hundred bad movies: big blank head, huge eyes, spindly body of pale green. It stood in a small metal tub atop a board. Someone touched a torch to the straw and set the effigy on fire.

Why? As far as Noah could see, the aliens weren't bothering anybody. They were even good for business. It was just an excuse for people floundering in a bad economy to vent their anger—

Were these his thoughts? Noah's? Who was he now?

Police sirens screamed farther down the street. Cops appeared on foot, in riot gear. A public-address system blared, its words audible even through the shop window: "Disperse now! Open flame is not allowed on the streets! You do not have a parade permit! Disperse now!"

Someone threw something heavy, and the other window of the gyro place shattered.

Glass rained down on the empty tables in that corner. Noah jerked upright and raced to the back of the tiny restaurant, away from the windows. The cook was shouting in Greek. People left the parade, or joined it from side streets, and began to hurl rocks and bottles at the police. The cops retreated to the walls and doorways across Broadway and took out grenades of tear gas.

On the sidewalk outside, a small child stumbled by, crying and bleeding and terrified.

The person who Noah was now didn't think, didn't hesitate. He ran out into the street, grabbed the child, and ran back into the restaurant. He wasn't quite fast enough to escape the spreading gas. His nose and eyes shrieked in agony, even as he held his breath and thrust the child's head under his jacket.

Into the tiny kitchen, following the fleeing cook and waiter, and out the back door to an alley of overflowing garbage cans. Noah kept running, even though his agonized vision was blurring. Store owners had all locked their doors. But he had outrun the tear gas, and now a woman was leaning out of

the window of her second-floor apartment, craning her neck to see through brick walls to the action two streets away. Gunfire sounded. Over its echo off the steel and stone canyons, Noah shouted up, "A child got gassed! Please—throw down a bottle of water!"

She nodded and disappeared. To his surprise, she actually appeared on the street to help a stranger, carrying a water bottle and towel. "I'm a nurse, let me have him . . . aahh." Expertly she bathed the child's eyes, and then Noah's, just as if a battle wasn't going on within hearing if not within sight.

"Thank you," Noah gasped. "It was. . . ." He stopped.

Something was happening in his head, and it wasn't due to the sugarcane. He felt an immediate and powerful kinship with this woman. How was that possible? He'd never seen her before. Nor was the attraction romantic—she was in late middle age, with graying hair and a drooping belly. But when she smiled at him and said, "You don't need the ER," something turned over in Noah's heart. What the fuck?

It must be the sugarcane.

But the feeling didn't have the creamy, slightly unreal feel of sugarcane.

She was still talking. "You probably couldn't get into any ER anyway, they'll all be jammed. I know—I was an ER nurse. But this kid'll be fine. He got almost none of the gas. Just take him home and calm him down."

"Who . . . who are you?"

"It doesn't matter." And she was gone, backing into the vestibule of her apartment building, the door locking automatically behind her. Restoring the anonymity of New York.

Whatever sense of weird recognition and bonding Noah had felt with her, it obviously had not been mutual. He tried to shake off the feeling and concentrate on the kid, who was wailing like a hurricane. The effortless competence bestowed by the sugarcane was slipping away. Noah knew nothing about children. He made a few ineffective soothing noises and picked up the child, who kicked him.

More police sirens in the distance. Eventually he found a precinct station, staffed only by a scared-looking civilian desk clerk; probably everyone else was at the riot. Noah left the kid there. Somebody would be looking for him. Noah walked back to West End Avenue, crossed it, and headed northeast to Elizabeth's apartment. His eyes still stung, but not too badly. He had escaped the worst of the gas cloud.

Elizabeth answered the door. "Where the hell did you go? Damn it, Noah, Mom's arriving any minute! She texted!"

"Well, I'm here now, right?"

"Yes, you're here now, but of all the shit-brained times to go out for a stroll! How did you tear your jacket?"

"Dunno." Neither his sister nor his brother seemed aware that eight blocks away there had been—maybe

still was—an anti-alien riot going on. Noah didn't feel like informing them.

Ryan held his phone. "She's here. She texted. I'll go down."

Elizabeth said, "Ryan, she can probably pay off a cab and take an elevator by herself."

Ryan went anyway. *He had always been their mother's favorite,* Noah thought wearily. Except around Elizabeth, Ryan was affable, smooth, easy to get along with. His wife was charming, in an exaggeratedly feminine sort of way. They were going to give Marianne a grandchild.

It was an effort to focus on his family. His mind kept going back to that odd, unprecedented feeling of kinship with a person he had never seen before and probably had nothing whatsoever in common with. What was that all about?

"Elizabeth," his mother said. "And Noah! I'm so glad you're here. I've got . . . I've got a lot to tell you all. I—"

And his mother, who was always equal to anything, abruptly turned pale and fainted.

MARIANNE

Stupid, stupid—she never passed out! To the three faces clustered above her like balloons on sticks she said irritably, "It's nothing—just hypoglycemia. I

haven't eaten since this morning. Elizabeth, if you have some juice or something. . . ."

Juice was produced, crackers, slightly moldy cheese.

Marianne ate. Ryan said, "I didn't know you were hypoglycemic, Mom."

"I'm fine. Just not all that young anymore." She put down her glass and regarded her three children.

Elizabeth, scowling, looked so much like Kyle—was that why Marianne and Elizabeth had never gotten along? Her gorgeous alcoholic husband, the mistake of Marianne's life, had been dead for fifteen years. Yet here he was again, ready to poke holes in anything Marianne said.

Ryan, plain next to his beautiful sister but so much easier to love. Everybody loved Ryan, except Elizabeth.

And Noah, problem child, she and Kyle's last-ditch effort to save their doomed marriage. Noah was drifting and, she knew without being able to help, profoundly unhappy.

Were all three of them, and everybody else on the planet, going to die, unless humans and Denebs together could prevent it?

She hadn't fainted from hypoglycemia, which she didn't have. She had fainted from sheer delayed, maternal terror at the idea that her children might all perish. But she was not going to say that to her kids. And the fainting wasn't going to happen again.

"I need to talk to you," she said, unnecessarily. But

how to begin something like this? "I've been talking to the aliens. In the *Embassy*."

"We know, Evan told us," Noah said, at the same moment that Elizabeth, quicker, said sharply, *"Inside?"*

"Yes. The Deneb ambassador requested me."

"Requested you? Why?"

"Because of the paper I just published. The aliens—did any of you read the copies of my paper I e-mailed you?"

"I did," Ryan said. Elizabeth and Noah said nothing. Well, Ryan was the scientist.

"It was about tracing human genetic diversity through mitochondrial evolution. Thirty mitochondrial haplogroups had been discovered. I found the thirty-first. That wouldn't really be a big deal, except that—in a few days this will be common knowledge but you must keep it among yourselves until the ambassador announces—the aliens belong to the thirty-first group, L7. They're human."

Silence.

"Didn't you understand what I just—"

Elizabeth and Ryan erupted with questions, expressions of disbelief, arm waving. Only Noah sat quietly, clearly puzzled. Marianne explained what Ambassador Smith—impossible name!—had told her. When she got to the part about the race that had taken humans to "World" also leaving titanium tablets engraved with astronomical diagrams, Elizabeth exploded. "Come on, Mom, this fandango makes no sense!"

"The Denebs are *here*," Marianne pointed out. "They did find us. And the Denebs are going to give tissue samples. Under our strict human supervision. They're expanding the *Embassy* and allowing in humans. Lots of humans, to examine their biology and to work with our scientists."

"Work on what?" Ryan said gently. "Mom, this can't be good. They're an invasive species."

"Didn't you hear a word I said?" Marianne said. God, if Ryan, the scientist, could not accept truth, how would humanity as a whole? "They're not 'invasive,' or at least not if our testing confirms the ambassador's story. They're native to Earth."

"An invasive species is native to Earth. It's just not in the ecological niche it evolved for."

Elizabeth said, "Ryan, if you bring up purple loosestrife, I swear I'm going to clip you one. Mom, did anybody think to ask this ambassador the basic question of why they're here in the first place?"

"Don't talk to me like I'm an idiot. Of course we did. There's a—" She stopped and bit her lip, knowing how this would sound. "You all know what panspermia is?"

"Yes," said Elizabeth.

"Of course." Ryan.

"No." Noah.

"It's the idea that original life in the galaxy—" whatever *that* actually was, all the textbooks would now need to be rewritten "—came from drifting clouds of organic molecules. We know that such

molecules exist inside meteors and comets and that they can, under some circumstances, survive entry into atmospheres. Some scientists, like Fred Hoyle and Stephen Hawking, have even endorsed the idea that new biomolecules are still being carried down to Earth. The Denebs say that there is a huge, drifting cloud of spores—well, they're technically not spores, but I'll come to that in a minute—drifting toward Earth. Or, rather, we're speeding toward it, since the solar system rotates around the center of the galaxy and the entire galaxy moves through space relative to the cosmic microwave background. Anyway, ten months from now, Earth and this spore cloud will meet. And the spores are deadly to humans."

Elizabeth said skeptically, "And they know this *how*?"

"Because two of their colony planets lay in the path of the cloud and were already exposed. Both populations were completely destroyed. The Denebs have recordings. Then they sent unmanned probes to capture samples, which they brought with them. They say the samples are a virus, or something like a virus, but encapsulated in a coating that isn't like anything viruses can usually make. Together, aliens and humans are going to find a vaccine or a cure."

More silence. Then all three of her children spoke together, but in such different tones that they might have been discussing entirely different topics.

Ryan: "In ten months? A vaccine or cure for an

unknown pathogen in ten months? It took the CDC six months just to fully identify the bacterium in Legionnaires' disease!"

Elizabeth: "If they're so technologically superior, they don't need us to develop any sort of 'cure'!"

Noah: "What do the spores do to people?"

Marianne answered Noah first, because his question was the simplest. "They act like viruses, taking over cellular machinery to reproduce. They invade the lungs and multiply and then . . . then victims can't breathe. It only takes a few days." A terrible, painful death. A sudden horror came into her mind: her three children gasping for breath as their lungs were swamped with fluid, until they literally drowned. All of them.

"Mom," Ryan said gently, "are you all right? Elizabeth, do you have any wine or anything?"

"No," said Elizabeth, who didn't drink. Marianne suddenly, ridiculously, clung to that fact, as if it could right the world: her two-fisted cop daughter, whose martial arts training enabled her to take down a two-hundred-fifty-pound attacker, had a Victorian lady's fastidiousness about alcohol. Stereotypes didn't hold. The world was more complicated than that. The unexpected existed—a Border Patrol section chief did not drink!—and therefore an unexpected solution could be found to this unexpected problem. Yes.

She wasn't making sense, and knew it, and didn't care. Right now, she needed hope more than sense.

The Denebs, with technology an order of magnitude beyond humans, couldn't deal with the spore cloud, but Elizabeth didn't drink and, therefore, together Marianne and Smith and—throw in the president and WHO and the CDC and USAMRIID, why not—could defeat mindless space-floating dormant viruses.

Noah said curiously, "What are you smiling about, Mom?"

"Nothing." She could never explain.

Elizabeth blurted, "So even if all this shit is true, what the fuck makes the Dennies think that *we* can help them?"

Elizabeth didn't drink like a cop, but she swore like one. Marianne said, "They don't know that we can. But their biological sciences aren't much more advanced than ours, unlike their physical sciences. And the spore cloud hits Earth next September. The Denebs have twenty-five years."

"Do you believe that their biological sciences aren't as advanced as their physics and engineering?"

"I have no reason to disbelieve it."

"If it's true, then we're their lab rats! They'll test whatever they come up with on us, and then they'll sit back in orbit or somewhere to see if it works before taking it home to their own planet!"

"That's one way to think of it," Marianne said, knowing that this was exactly how a large part of the media would think of it. "Or you could think of it as a rescue mission. They're trying to help us while there's time, if not much time."

Ryan said, "Why do they want you? You're not a virologist."

"I don't know," Marianne said.

Elizabeth erupted once more, leaping up to pace around the room and punch at the air. "I don't believe it. Not any of it, including the so-called 'cloud.' There are things they aren't telling us. But you, Mom—you just swallow whole anything they say! You're unbelievable!"

Before Marianne could answer, Noah said, "I believe you, Mom," and gave her his absolutely enchanting smile. He had never really become aware of the power of that smile. It conferred acceptance, forgiveness, trust, the sweet sadness of fading sunlight. "All of us believe everything you said.

"We just don't want to."

MARIANNE

Noah was right. Ryan was right. Elizabeth was wrong.

The spore cloud existed. Although technically not spores, that was the word the Deneb translator gave out, and the word stuck among astronomers because it was a term they already knew. As soon as the cloud's coordinates, composition, and speed were given by the Denebs to the UN, astronomers around the globe found it through spectral analysis and the dimming of stars behind it. Actually, they had known

of its existence all along but had assumed it was just another dust cloud too small and too cool to be incubating stars. Its trajectory would bring it in contact with Earth when the Denebs said, in approximately ten months.

Noah was right in saying that people did not want to believe this. The media erupted into three factions. The most radical declared the "spore cloud" to be just harmless dust and the Denebs plotting, in conspiracy with the UN and possibly several governments, to take over Earth for various evil and sometimes inventive purposes. The second faction believed that the spore threat might be real but that, echoing Elizabeth, humanity would become "lab rats" in alien experiments to find some sort of solution, without benefit to Earth. The third group, the most scientifically literate, focused on a more immediate issue: They did not want the spore samples brought to Earth for research, calling them the real danger.

Marianne suspected the samples were already here. NASA had never detected shuttles or other craft going between the ship in orbit around the moon and the *Embassy*. Whatever the aliens wanted here probably already was.

Teams of scientists descended on New York. Data were presented to the UN, the only body that Smith would deal with directly. Everyone kept saying that time was of the essence. Marianne, prevented from resuming teaching duties by the insistent reporters clinging to her like lint, stayed in Elizabeth's

apartment and waited. Smith had given her a private communication device, which no one except the UN Special Mission knew about. Sometimes as she watched TV or cleaned Elizabeth's messy apartment, Marianne pondered this: An alien had given her his phone number and asked her to wait. It was almost like dating again.

Time is of the essence! Time is of the essence! A few weeks went by in negotiations she knew nothing of. Marianne reflected on the word "essence." Elizabeth worked incredible hours; the Border Patrol had been called in to help keep "undesirables" away from the harbor, assisting the Coast Guard, INS, NYPD, and whoever else the city deemed pertinent. Noah had left again and did not call.

Evan was with her at the apartment when the Deneb communication device rang. "What's that?" he said off-handedly, wiping his mouth. He had brought department gossip and bags of sushi. The kitchen table was littered with tuna tataki, cucumber wraps, and hotategai.

Marianne said, "It's a phone call from the Deneb ambassador."

Evan stopped wiping and, paper napkin suspended, stared at her.

She put the tiny device on the table, as instructed, and spoke the code word. A mechanical voice said, "Dr. Marianne Jenner?"

"Yes."

"This is Ambassador Smith. We have reached an

agreement with your UN to proceed, and will be expanding our facilities immediately. I would like you to head one part of the research."

"Ambassador, I am not an epidemiologist, not an immunologist, not a physician. There are many others who—"

"Yes. We don't want you to work on pathogens or with patients. We want you to identify human volunteers who belong to the haplogroup you discovered, L7."

Something icy slid along Marianne's spine. "Why? There hasn't been very much genetic drift between our . . . ah . . . groups of humans in just 150,000 years. And mitochondrial differentiation should play no part in—"

"This is unconnected with the spores."

"What is it connected with?" *Eugenics, master race, Nazis. . . .*

"This is purely a family matter."

Marianne glanced at Evan, who was writing furiously on the white paper bag that sushi had come in: GO! ACCEPT! ARE YOU DAFT? CHANCE OF A LIFETIME!

She said, "A family matter?"

"Yes. Family matters to us very much. Our whole society is organized around ancestral loyalty."

To Marianne's knowledge, this was the first time the ambassador had ever said anything, to anyone, about how Deneb society was organized. Evan, who'd been holding the paper bag six inches from

her face, snatched it back and wrote CHANCE OF SIX THOUSAND LIFETIMES!

The number of generations since Mitochondrial Eve.

Smith continued, "I would like you to put together a small team of three or four people. Lab facilities will be provided, and volunteers will provide tissue samples. The UN has been very helpful. Please assemble your team on Tuesday at your current location and someone will come to escort you. Do you accept this post?"

"Tuesday? That's only—"

"Do you accept this post?"

"I . . . yes."

"Good. Good-bye."

Evan said, "Marianne—"

"Yes, of course, you're part of the 'team.' God, none of this is real."

"Thank you, thank you!"

"Don't burble, Evan. We need two lab techs. How can they have facilities ready by Tuesday? It isn't possible."

"Or so we think," Evan said.

NOAH

It hadn't been possible to stay in the apartment. His mother had the TV on nonstop, every last news show,

no matter how demented, that discussed the aliens or their science. Elizabeth burst in and out again, perpetually angry at everything she didn't like in the world, which included the Denebs. The two women argued at the top of their lungs, which didn't seem to bother either of them at anything but an intellectual level, but which left Noah unable to eat anything without nausea or sleep without nightmares or walk around without knots in his guts.

He found a room in a cheap boardinghouse, and a job washing dishes, paid under the counter, in a taco place. Even though the tacos came filmed with grease, he could digest better here than at Elizabeth's, and anyway he didn't eat much. His wages went on sugarcane.

He became in turn an observant child, a tough loner, a pensive loner, a friendly panhandler. Sugarcane made him, variously, mute or extroverted or gloomy or awed or confident. But none of it was as satisfying as it once had been. Even when he was someone else, he was still aware of being Noah. That had not happened before. The door out of himself stayed ajar. Increasing the dose didn't help.

Two weeks after he'd left Elizabeth's, he strolled on his afternoon off down to Battery Park. The late October afternoon was unseasonably warm, lightly overcast, filled with autumn leaves and chrysanthemums and balloon sellers. Tourists strolled the park, sitting on the benches lining the promenade, feeding the pigeons, touring Clinton Castle. Noah stood for

a long time leaning on the railing above the harbor, and so witnessed the miracle.

"It's happening! Now!" someone shouted.

What was happening? Noah didn't know, but evidently someone did because people came running from all directions. Noah would have been jostled and squeezed from his place at the railing if he hadn't gripped it with both hands. People stood on the benches; teenagers shimmied up the lamp poles. Figures appeared on top of the Castle. A man began frantically selling telescopes and binoculars evidently hoarded for this occasion. Noah bought a pair with money he'd been going to use for sugarcane.

"Move that damn car!" someone screamed as a Ford honked its way through the crowd, into what was supposed to be a pedestrian area. Shouts, cries, more people rushing from cars to the railings.

Far out in the harbor, the Deneb *Embassy*, its energy shield dull under the cloudy sky, began to glow. Through his binoculars Noah saw the many-faceted dome shudder—not just shake but shudder in a rippling wave, as if alive. *Was* it alive? Did his mother know?

"Aaaahhhhh," the crowd went.

The energy shield began to spread. Either it had thinned or changed composition, because for a long moment—maybe ninety seconds—Noah could almost see through it. A suggestion of floor, walls, machinery . . . then opaque again. But the "floor"

was growing, reaching out to cover more territory, sprouting tentacles of material and energy.

Someone on the bridge screamed, "They're taking over!"

All at once, signs were hauled out, people leaped onto the roofs of cars that should not have been in the park, chanting began. But not much chanting or many people. Most crowded the railings, peering out to sea.

In ten minutes, the *Embassy* grew and grew laterally, silently spreading across the calm water like a speeded-up version of an algae bloom. When it hardened again—that's how it looked to Noah, like molten glass hardening as it cooled—the structure was six times its previous size. The tentacles had become docks, a huge one toward the city and several smaller ones to one side. By now even the chanters had fallen silent, absorbed in the silent, awing, monstrous feat of unimaginable construction. When it was finished, no one spoke.

Then an outraged voice demanded, "Did those bastards get a city permit for that?"

It broke the silence. Chanting, argument, exclaiming, pushing all resumed. A few motorists gunned their engine, futilely, since it was impossible to move vehicles. The first of the motorcycle cops arrived: NYPD, then Special Border Patrol, then chaos.

Noah slipped deftly through the mess, back toward the streets north of the Battery. He had to be at work in an hour. The *Embassy* had nothing to do with him.

MARIANNE

A spore cloud doesn't look like anything at all.

A darker patch in dark space, or the slightest of veils barely dimming starlight shining behind it. Earth's astronomers could not accurately say how large it was, or how deep. They relied on Deneb measurements, except for the one fact that mattered most, which human satellites in deep space and human ingenuity at a hundred observatories were able to verify: The cloud was coming. The path of its closest edge would intersect Earth's path through space at the time the Denebs had said: early September.

Marianne knew that almost immediately following the UN announcement, madness and stupidity raged across the planet. Shelters were dug or sold or built, none of which would be effective. If air could get in, so could spores. In Kentucky, some company began equipping deep caves with air circulation, food for a year, and high-priced sleeping berths: reverting to Paleolithic caveman. She paid no more attention to this entrepreneurial survivalism than to the televised protests, destructive mobs, peaceful marches, or lurid artist depictions of the cloud and its presumed effects. She had a job to do.

On Tuesday she, Evan, and two lab assistants were taken to the submarine bay at UN Special Mission

Headquarters. In the sub, Max and Gina huddled in front of the porthole, or maybe it was a porthole-like viewscreen, watching underwater fish. Maybe fish were what calmed them. Although they probably didn't need calming: Marianne, who had worked with both before, had chosen them as much for their even temperaments as for their competence. Government authorities had vetted Max and Gina for, presumably, both crime-free backgrounds and pro-alien attitudes. Max, only twenty-nine, was the computer whiz. Gina, in her mid-thirties and the despair of her Italian mother because Gina hadn't yet married, made the fewest errors Marianne had ever seen in sample preparation, amplification, and sequencing.

Evan said to Marianne, "Children all sorted out?"

"Never. Elizabeth won't leave New York, of course." ("Leave? Don't you realize I have a job to do, protecting citizens from your aliens?" Somehow they had become Marianne's aliens.) "Ryan took Connie to her parents' place in Vermont and he went back to his purple loosestrife in Canada."

"And Noah?" Evan said gently. He knew all about Noah; why, Marianne wondered yet again, did she confide in this twenty-eight-year-old gay man as if he were her age, and not Noah's? Never mind; she needed Evan.

She shook her head. Noah had again disappeared.

"He'll be fine, then, Marianne. He always is."

"I know."

"Look, we're docking."

They disembarked from the sub to the underside of the *Embassy*. Whatever the structure's new docks topside were for, it wasn't for the transfer of medical personnel. Evan said admiringly, "Shipping above us hasn't even been disrupted. Dead easy."

"Oh, those considerate aliens," Marianne murmured, too low for the sub captain, still in full-dress uniform, to hear. Her and Evan's usual semi-sarcastic banter helped to steady her: the real toad in the hallucinatory garden.

The chamber beyond the airlock had not changed, although this time they were met by a different alien. Female, she wore the same faint shimmer of energy-shield protection over her plain tunic and pants. Tall, coppery-skinned, with those preternaturally huge dark eyes, she looked about thirty, but how could you tell? Did the Denebs have plastic surgery? Why not? They had everything else.

Except a cure for spore disease.

The Deneb introduced herself ("Scientist Jones"), went through the so-glad-you're-here speech coming disconcertingly from the ceiling. She conducted them to the lab, then left immediately. Plastic surgery or no, Marianne was grateful for alien technology when she saw her lab. Nothing in it was unfamiliar, but all of it was state-of-the-art. Did they create it as they had created the *Embassy*, or order it wholesale? Must be the latter—the state-of-the-art gene sequencer still bore the label ILLUMINA. The equipment must have

been ordered, shipped, paid for (with what?) either over the previous months of negotiation or as the world's fastest rush shipping.

Beside it sat a rack of vials with blood samples, all neatly labeled.

Max immediately went to the computer and turned it on. "No Internet," he said, disappointed. "Just a LAN, and . . . wow, this is heavily shielded."

"You realize," Marianne said, "that this is a minor part of the science going on aboard the *Embassy*. All we do is process mitochondrial DNA to identify L7 haplogroup members. We're a backwater on the larger map."

"Hey, we're *here,"* Max said. He grinned at her. "Too bad, though, about no World of Warcraft. This thing has no games at all. What do I do in my spare time?"

"Work," Marianne said, just as the door opened and two people entered. Marianne recognized one of them, although she had never met him before. Unsmiling, dark-suited, he was Security. The woman was harder to place. Middle-aged, wearing jeans and a sweater, her hair held back by a too-girlish headband. But her smile was warm, and it reached her eyes. She held out her hand.

"Dr. Jenner? I'm Lisa Guiterrez, the genetics counselor. I'll be your liaison with the volunteers. We probably won't be seeing each other again, but I wanted to say hello. And you're Dr. Blanford?"

"Yes," Evan said.

Marianne frowned. "Why do we need a genetic counselor? I was told our job is to simply process blood samples to identify members of the L7 haplogroup."

"It is," Lisa said, "and then I take it from there."

"Take *what* from there?"

Lisa studied her. "You know, of course, that the Denebs would like to identify those surviving human members of their own haplogroup. They consider them family. The concept of family is pivotal to them."

Marianne said, "You're not a genetic counselor. You're a xenopsychologist."

"That, too."

"And what happens after the long-lost family members are identified?"

"I tell them that they are long-lost family members." Her smile never wavered.

"And then?"

"And then they get to meet Ambassador Smith."

"And *then?"*

"No more 'then.' The Ambassador just wants to meet his six-thousand-times-removed cousins. Exchange family gossip, invent some in-jokes, confer about impossible Uncle Harry."

So she had a sense of humor. Maybe it was a qualification for billing oneself a "xenopsychologist," a profession that until a few months ago had not existed.

"Nice to meet you both," Lisa said, widened her smile another fraction of an inch, and left.

Evan murmured, "My, people come and go so quickly here."

But Marianne was suddenly not in the mood, not even for quoted humor from such an appropriate source as *The Wizard of Oz*. She sent a level gaze at Evan, Max, Gina.

"Okay, team. Let's get to work."

II: S minus 9.5 months

MARIANNE

There were four other scientific teams aboard the *Embassy*, none of which were interested in Marianne's backwater. The other teams consisted of scientists from the World Health Organization, the Centers for Disease Control, the United States Army Medical Research Institute for Infectious Diseases, the Institute of Molecular Medicine at Oxford, the Beijing Genomics Institute, Kyushu University, and the Scripps Clinic and Research Foundation, perhaps the top immunology center in the world. Some of the most famous names in the scientific and medical worlds were here, including a dozen Nobel winners. Marianne had no knowledge of,

but could easily imagine, the political and scientific competition to get aboard the *Embassy*. The Americans had an edge because the ship sat in New York Harbor and that, too, must have engendered political threats and counter threats, bargaining and compromise.

The most elite group, and by far the largest, worked on the spores: germinating, sequencing, investigating this virus that could create a worldwide human die-off. They worked in negative-pressure, biosafety-level-four chambers. Previously the United States had had only two BSL4 facilities, at the CDC in Atlanta and at USAMRIID in Maryland. Now there was a third, dazzling in its newness and in the completeness of its equipment. The Spore Team had the impossible task of creating some sort of vaccine or other method of neutralizing, worldwide, a pathogen not native to Earth, within ten months.

The Biology Team investigated alien tissues and genes. The Denebs gave freely of whatever was asked: blood, epithelial cells, sperm, biopsy samples. "Might even give us a kidney, if we asked nicely enough," Evan said. "We know they have two."

Marianne said, "*You* ask, then."

"Not me. Too frightful to think what they might ask in exchange."

"So far, they've asked nothing."

Almost immediately the Biology Team verified the Denebs as human. Then began the long process of finding and charting the genetic and evolutionary

differences between the aliens and Terrans. The first, announced after just a few weeks, was that all of the seventeen aliens in the Embassy carried the same percentage as Terrans of Neanderthal genes: from one to four percent.

"They're us," Evan said.

"Did you doubt it?" Marianne asked.

"No. But more interesting, I think, are the preliminary findings that the Denebs show so much less genetic diversity than we do. That wanker Wilcox must be weeping in his ale."

Patrick Wells Wilcox was the current champion of the Toba Catastrophe Theory, which went in and out of scientific fashion. Seventy thousand years ago the Toba supervolcano in Indonesia had erupted. This had triggered such major environmental change, according to theory proponents, that a "bottleneck event" had occurred, reducing the human population to perhaps 10,000 individuals. The result had been a great reduction in human genetic diversity. Backing for the idea came from geology as well as coalescence evidence of some genes, including mitochondrial, Y-chromosome, and nuclear. Unfortunately, there was also evidence that the bottleneck event had never occurred. If the Denebs, removed from Earth well before the supervolcano, showed less diversity than Terrans, then Terran diversity couldn't have been reduced all that much.

Marianne said, "Wilcox shouldn't weep too soon."

"Actually, he never weeps at all. Gray sort of wanker.

Holes up in his lab at Cambridge and glowers at the world through medieval arrow slits."

"Dumps boiling oil on dissenting paleontologists," Marianne suggested.

"Actually, Wilcox may not even be human. Possibly an advance scout for the Denebs. Nobody at Cambridge has noticed it so far."

"Or so we think." Marianne smiled. She and Evan never censored their bantering, which helped lower the hushed, pervasive anxiety they shared with everyone else on the *Embassy*. It was an anxious ship.

The third scientific team aboard was much smaller. Physicists, they worked with "Scientist Jones" on the astronomy of the coming collision with the spore cloud.

The fourth team she never saw at all. Nonetheless, she suspected they were there, monitoring the others, shadowy underground non-scientists unknown even to the huge contingent of visible security.

Marianne looked at the routine work on her lab bench: polymerase chain reaction to amplify DNA samples, sequencing, analyzing data, writing reports on the genetic inheritance of each human volunteer who showed up at the Deneb "collection site" in Manhattan. A lot of people showed up. So far, only two of them belonged to Ambassador Smith's haplogroup. "Evan, we're not really needed, you and I. Gina and Max can handle anything our expensive brains are being asked to do."

Evan said, "Right, then. So let's have a go at exploring. Until we're stopped, anyway."

She stared at him. "Okay. Yes. Let's explore."

NOAH

Noah emerged from the men's room at the restaurant. During the mid-afternoon lull they had no customers except for a pair of men slumped over one table in the back. "Look at this!" the waitress said to him. She and the cook were both huddled over her phone, strange enough since they hated each other. But Cindy's eyes were wide from something other than her usual drugs, and Noah took a look at the screen of the sophisticated phone, mysteriously acquired and gifted by Cindy's current boyfriend before he'd been dragged off to Riker's for assault with intent.

> VOLUNTEERS WANTED TO DONATE BLOOD
>
> PAYMENT: $100
>
> HUMAN NURSES TO COLLECT SMALL BLOOD SAMPLES
>
> DENEB EMBASSY PIER, NEW YORK HARBOR

"Demonios del Diablo," Miguel muttered. *"Vampiros!"* He crossed himself.

Noah said dryly, "I don't think they're going to drink the blood, Miguel." The dryness was false. His heart had begun to thud. People like his mother got to see the *Embassy* up close, not people like Noah. Did the ad mean that the Denebs were going to take human blood samples on the large dock he had just seen form out of nothing?

Cindy had lost interest. "No fucking customers except those two sorry asses in the corner, and they never tip. I shoulda stood in bed."

"Miguel," Noah said, "can I have the afternoon off?"

Noah stood patiently in line at the blood-collection site. If any of the would-be volunteers had hoped to see aliens, they had been disappointed. Noah was not disappointed; after all, the ad on Cindy's phone had said HUMAN NURSES TO COLLECT SMALL BLOOD SAMPLES.

He was, however, disappointed that the collection site was not on the large dock jutting out from the *Embassy* under its glittering energy shield. Instead, he waited to enter what had once been a warehouse at the land end of a pier on the Manhattan waterfront. The line, huddled against November drizzle, snaked in loops and ox-bows for several blocks, and he was fascinated by the sheer diversity of people. A woman in a fur-lined Burberry raincoat and high, polished boots. A bum in jeans with an indecent tear on the

ass. Several giggling teenage girls under flowered umbrellas. An old man in a winter parka. A nerdy-looking boy with an iPad protected by flexible plastic. Two tired-looking middle-aged women. One of those said to the other, "I could pay all that back rent if I get this alien money, and—"

Noah tapped her arm. "Excuse me, ma'am—what 'alien money'?" The $100 fee for blood donation didn't seem enough to pay *all that back rent*.

She turned. "If they find out you're part of their blood group, you get a share of their fortune. You know, like the Indians with their casino money. If you can prove you're descended from their tribe."

"No, that's not it," the old man in the parka said impatiently. "You get a free energy shield like theirs to protect you when the spore cloud hits. They take care of family."

The bum muttered, "Ain't no spore cloud."

The boy said with earnest contempt, "You're all wrong. This is just—the Denebs are the most significant thing to happen to Earth, ever! Don't you get it? We're not alone in the universe!"

The bum laughed.

Eventually Noah reached Building A. Made of concrete and steel, the building's walls were discolored, its high-set windows grimy. Only the security machines looked new, and they made high-tech examinations of Noah's person inside and out. His wallet, cell, jacket, and even shoes were left in a locker before he shuffled in paper slippers along the

enclosed corridor to Building B, farther out on the pier. Someone was very worried about terrorism.

"Please fill out this form," said a pretty, grim-faced young woman. Not a nurse: security. She looked like a faded version of his sister, bleached of Elizabeth's angry command. Noah filled out the form, gave his small vial of blood, and filed back to Building B. He felt flooded with anticlimactic letdown. When he had reclaimed his belongings, a guard handed him a hundred dollars and a small round object the size and feel of a quarter.

"Keep this with you," a guard said. "It's a one-use, one-way communication device. In the unlikely event that it rings, press the center. That means that we'd like to see you again."

"If you do, does that mean I'm in the alien's haplogroup?"

He didn't seem to know the word. "If it rings, press the center."

"How many people have had their devices ring?"

The guard's face changed, and Noah glimpsed the person behind the job. He shrugged. "I never heard of even one."

"Is it—"

"Move along, please." The job mask was back.

Noah put on his shoes, balancing first on one foot and then on the other to avoid touching the grimy floor. It was like being in an airport. He started for the door.

"Noah!" Elizabeth sailed toward him across a sea

of stained concrete. "What the hell are you doing here?"

"Hi, Lizzie. Is this part of the New York State border?"

"I'm on special assignment."

God, she must hate that. Her scowl threatened to create permanent furrows in her tanned skin. But Elizabeth always obeyed the chain of command.

"Noah, how can you—"

A bomb went off.

A white light blinded Noah. His hearing went dead, killed by the sheer onslaught of sound. His legs wobbled as his stomach lurched. Then Elizabeth knocked him to the ground and hurled herself on top of him. A few seconds later she was up and running and Noah could hear her again: "Fucking flashbang!"

He stumbled to his feet, his eyes still painful from the light. People screamed and a few writhed on the floor near a pile of clothes that had ignited. Black smoke billowed from the clothing, setting the closest people to coughing, but no one seemed dead. Guards leaped at a young man shouting something lost in the din.

Noah picked up his shoes and slipped outside, where sirens screamed, honing in from nearby streets. The salt-tanged breeze touched him like a benediction.

A flashbang. You could buy a twelve-pack of them on the Internet for fifty bucks, although those weren't

supposed to ignite fires. Whatever that protestor had hoped to accomplish, it was ineffective. Just like this whole dumb blood-donation expedition.

But he had a hundred dollars he hadn't had this morning, which would buy a few good hits of sugarcane. And in his pocket, his fingers closed involuntarily on the circular alien coin.

MARIANNE

Marianne was surprised at how few areas of the *Embassy* were restricted.

The BSL4 areas, of course. The aliens' personal quarters, not very far from the BSL4 labs. But her and Evan's badges let them roam pretty much everywhere else. Humans rushed past them on their own errands, some nodding in greeting but others too preoccupied to even notice they were there.

"Of course there are doors we don't even see," Evan said. "Weird alien cameras we don't see. Denebs we don't see. They know where we are, where everyone is, every minute. Dead easy."

The interior of the *Embassy* was a strange mixture of materials and styles. Many corridors were exactly what you'd expect in a scientific research facility: unadorned, clean, lined with doors. The walls seemed to be made of something that was a cross between metal and plastic, and did not dent. Walls

in the personal quarters and lounges, on the other hand, were often made of something that reminded her of Japanese rice paper, but soundproof. She had the feeling that she could have put her fist through them, but when she actually tried this, the wall only gave slightly, like a very tough piece of plastic. Some of these walls could be slid open, to change the size or shapes of rooms. Still other walls were actually giant screens that played constantly shifting patterns of subtle color. Finally, there were odd small lounges that seemed to have been furnished from upscale mail-order catalogues by someone who thought anything Terran must go with anything else: earth-tone sisal carpeting with a Victorian camelback sofa, Picasso prints with low Moroccan tables inlaid with silver and copper, a Navaho blanket hung on the wall above Japanese zabutons.

Marianne was tired. They'd come to one such sitting area outside the main dining hall, and she sank into an English club chair beside a small table of swooping purple glass. "Evan—do you really believe we are all going to die a year from now?"

"No." He sat in an adjoining chair, appreciatively patting its wide and upholstered arms. "But only because my mind refuses to entertain the thought of my own death in any meaningful way. Intellectually, though, yes. Or rather, nearly all of us will die."

"A vaccine to save the rest?"

"No, there is simply not enough time to get all the necessary bits and pieces sorted out. But the Denebs will save some Terrans."

"How?"

"Take a selected few back with them to that big ship in the sky."

Immediately she felt stupid that she hadn't thought of this before. Stupidity gave way to the queasy, jumpy feeling of desperate hope. "Take us *Embassy* personnel? To continue joint work on the spores?" Her children, somehow she would have to find a way to include Elizabeth, Noah, Ryan and Connie and the baby! But everyone here had family—

"No," Evan said. "Too many of us. My guess is just the Terran members of their haplogroup. Why else bother to identify them? And everything I've heard reinforces their emphasis on blood relationships."

"Heard from whom? We're in the lab sixteen hours a day—"

"I don't need much sleep. Not like you, Marianne. I talk to the Biology Group, who talk more than anybody else to the aliens. Also I chat with Lisa Guiterrez, the genetic counselor."

"And the Denebs told somebody they're taking their haplogroup members with them before the spore cloud hits?"

"No, of course not. When do the Denebs tell Terrans anything directly? It's all smiling evasion, heartfelt reassurances. They're like Philippine houseboys."

Startled, Marianne gazed at him. The vaguely racist reference was uncharacteristic of Evan, and had been said with some bitterness. She realized all over again how little Evan gave away about his past. When had he lived in the Philippines? What had happened between him and some apparently not forgiven houseboy? A former lover? Evan's sexual orientation was also something they never discussed, although of course she was aware of it. From his grim face, he wasn't going to discuss it now, either.

She said, "I'm going to ask Smith what the Denebs intend."

Evan's smooth grin had returned. "Good luck. The UN can't get information from him, the project's chief scientists can't get information from him, and you and I never see him. Just minor roadblocks to your plan."

"We really are lab rats," she said. And then, abruptly, "Let's go. We need to get back to work."

Evan said slowly, "I've been thinking about something."

"What?"

"The origin of viruses. How they didn't evolve from a single entity and don't have a common ancestor. About the theory that their individual origins were pieces of DNA or RNA that broke off from cells and learned to spread to other cells."

Marianne frowned. "I don't see how that's relevant."

"I don't either, actually."

"Then—"

"I don't know," Evan said. And again, "I just don't know."

NOAH

Noah was somebody else.

He'd spent his blood-for-the-Denebs money on sugarcane, and it turned out to be one of the really good transformations. He was a nameless soldier from a nameless army: brave and commanding and sure of himself. Underneath he knew it was an illusion (but he never used to know that!). However, it didn't matter. He stood on a big rock at the south end of Central Park, rain and discarded plastic bags blowing around him, and felt completely, if temporarily, happy. He was on top of the world, or at least seven feet above it, and nothing seemed impossible.

The alien token in his pocket began to chime, a strange syncopated rhythm, atonal as no iPhone ever sounded. Without a second's hesitation—he could face anything!—Noah pulled it from his pocket and pressed its center.

A woman's voice said, "Noah Richard Jenner?"

"Yes, ma'am!"

"This is Dr. Lisa Guiterrez at the Deneb embassy.

We would like to see you, please. Can you come as soon as possible to the UN Special Mission Headquarters at its pier?"

Noah drew a deep breath. Then full realization crashed around him, loud and blinding as last week's flashbang. Oh my God—why hadn't he seen it before? Maybe because he hadn't been a warrior before. His mother had—*son of a bitch*—

"Noah?"

He said, "I'll be there."

The submarine surfaced in an undersea chamber. A middle-aged woman in jeans and blazer, presumably Dr. Guiterrez, awaited Noah in the featureless room. He didn't much notice woman or room. Striding across the gangway, he said, "I want to see my mother. Now. She's Dr. Marianne Jenner, working here someplace."

Dr. Guiterrez didn't react as if this were news, or strange. She said, "You seem agitated." Hers was the human voice Noah had heard coming from the alien token.

"I am agitated! Where is my mother?"

"She's here. But first, someone else wants to meet you."

"I demand to see my mother!"

A door in the wall slid open, and a tall man with coppery skin and bare feet stepped through. Noah looked at him, and it happened again.

Shock, bewilderment, totally unjustified recognition—he knew this man, just as he had known the nurse who washed tear gas from his and a child's eyes during the West Side demonstration. Yet he'd never seen him before, and he was an *alien*. But the sense of kinship was powerful, disorienting, ridiculous.

"Hello, Noah Jenner," the ceiling said. "I am Ambassador Smith. Welcome to the *Embassy*."

"I—"

"I wanted to welcome you personally, but I cannot visit now. I have a meeting. Lisa will help you get settled here, should you choose to stay with us for a while. She will explain everything. Let me just say—"

Impossible to deny this man's sincerity, he meant every incredible word—

"—that I'm very glad you are here."

After the alien left, Noah stood staring at the door through which he'd vanished. "What is it?" Dr. Guiterrez said. "You look a bit shocked."

Noah blurted, "I know that man!" A second later he realized how dumb that sounded.

She said gently, "Let's go somewhere to talk, Noah. Somewhere less . . . wet."

Water dripped from the sides of the submarine, and some had sloshed onto the floor. Sailors and officers crossed the gangway, talking quietly. Noah followed Lisa from the sub bay, down a side corridor, and into an office cluttered with charts, printouts,

coffee mugs, a laptop—such an ordinary-looking place that it only heightened Noah's sense of unreality. She sat in an upholstered chair and motioned him to another. He remained standing.

She said, "I've seen this before, Noah. What you're experiencing, I mean, although usually it isn't as strong as you seem to be feeling it."

"Seen what? And who are you, anyway? I want to talk to my mother!"

She studied him, and Noah had the impression she saw more than he wanted her to. She said, "I'm Dr. Lisa Guiterrez, as Ambassador Smith said. Call me Lisa. I'm a genetics counselor serving as the liaison between the ambassador and those people identified as belonging to his haplotype, L7, the one identified by your mother's research. Before this post, I worked with Dr. Barbara Formisano at Oxford, where I also introduced people who share the same haplotype. Over and over again I've seen a milder version of what you seem to be experiencing now—an unexpected sense of connection between those with an unbroken line of mothers and grandmothers and great-grandmothers back to their haplogroup clan mother. It—"

"That sounds like bullshit!"

"—is important to remember that the connection is purely symbolic. Similar cell metabolisms don't cause shared emotions. But—an important 'but!'—symbols have a powerful effect on the human mind. Which in turn causes emotion."

Noah said, "I had this feeling once before. About a strange woman, and I had no way of knowing if she's my 'haplotype'!"

Lisa's gaze sharpened. She stood. "What woman? Where?"

"I don't know her name. Listen, I want to talk to my mother!"

"Talk to me first. Are you a sugarcane user, Noah?"

"What the hell does that have to do with anything?"

"Habitual use of sugarcane heightens certain imaginative and perceptual pathways in the brain. Ambassador Smith—well, let's set that aside for a moment. I think I know why you want to see your mother."

Noah said, "Look, I don't want to be ruder than I've already been, but this isn't your business. Anything you want to say to me can wait until I see my mother."

"All right. I can take you to her lab."

It was a long walk. Noah took in very little of what they passed, but then, there was very little to take in. Endless white corridors, endless white doors. When they entered a lab, two people that Noah didn't know looked up curiously. Lisa said, "Dr. Jenner—"

The other woman gestured at a far door. Before she could speak, Noah flung the door open. His mother sat at a small table, hands wrapped around a cup of coffee she wasn't drinking. Her eyes widened.

Noah said, "Mom—why the fuck didn't you ever tell me I was adopted?"

MARIANNE

Evan and Marianne sat in his room, drinking sixteen-year-old single-malt Scotch. She seldom drank but knew that Evan often did. Nor had she ever gone before to his quarters in the *Embassy*, which were identical to hers: ten-foot-square room with a bed, chest of drawers, small table, and two chairs. She sat on one of the straight-backed, utilitarian chairs while Evan lounged on the bed. Most of the scientists had brought with them a few items from home, but Evan's room was completely impersonal. No art, no framed family photos, no decorative pillows, not even a coffee mug or extra doughnut carried off from the cafeteria.

"You live like a monk," Marianne said, immediately realizing how drunk she must be to say that. She took another sip of Scotch.

"Why didn't you ever tell him?" Evan said.

She put down her glass and pulled at the skin on her face. The skin felt distant, as if it belonged to somebody else.

"Oh, Evan, how to answer that? First Noah was too little to understand. Kyle and I adopted him in some sort of stupid effort to save the marriage. I wasn't thinking straight—living with an alcoholic will do that, you know. If there was one stupid

B-movie scene of alcoholic and wife that we missed, I don't know what it was. Shouting, pleading, pouring away all the liquor in the house, looking for Kyle in bars at two a.m. . . . anyway. Then Kyle died and I was trying to deal with that and the kids and chasing tenure and there was just too much chaos and fragility to add another big revelation. Then somehow it got too late, because Noah would have asked why he hadn't been told before, and then somehow . . . it all just got away from me."

"And Elizabeth and Ryan never told him?"

"Evidently not. We yell a lot about politics and such but on a personal level, we're a pretty reticent family." She waved her hand vaguely at the room. "Although not as reticent as you."

Evan smiled. "I'm British of a certain class."

"You're an enigma."

"No, that was the Russians. Enigmas wrapped in riddles." But a shadow passed suddenly behind his eyes.

"What do you—"

"Marianne, let me fill you in on the bits and pieces of news that came in while you were with Noah. First, from the Denebs: They're bringing aboard the *Embassy* any members of their 'clan'—that's what the translator is calling the L7 haplogroup—who want to come. But you already know that. Second, the—"

"How many?"

"How many have we identified or how many want to come here?"

"Both." The number of L7 haplotypes had jumped

exponentially once they had the first few and could trace family trees through the female line.

"Sixty-three identified, including the three that Gina flew to Georgia to test. Most of the haplogroup may still be in Africa, or it may have largely died out. Ten of those want to visit the *Embassy*." He hesitated. "So far, only Noah wants to stay."

Marianne's hand paused, glass halfway to her mouth. "To *stay*? He didn't tell me that. How do you know?"

"After Noah . . . left you this afternoon, Smith came to the lab with that message."

"I see." She didn't. She had been in her room, pulling herself together after the harrowing interview with her son. Her adopted son. She hadn't been able to tell Noah anything about his parentage because she hadn't known anything: sealed adoption records. Was Noah the way he was because of his genes? Or because of the way she'd raised him? Because of his peer group? His astrological sign? Theories went in and out of fashion, and none of them explained personality.

She said, "What is Noah going to *do* here? He's not a scientist, not security, not an administrator. . . ." *Not anything*. It hurt her to even think it. Her baby, her lost one.

Evan said, "I have no idea. I imagine he'll either sort himself out or leave. The other news is that the Biology Team has made progress in matching Terran and Deneb immune-system components. There were

a lot of graphs and charts and details, but the bottom line is that ours and theirs match pretty well. Remarkably little genetic drift. Different antibodies, of course for different pathogens, and quite a lot of those, so no chance we'll be touching skin without their wearing their energy shields."

"So cancel the orgy."

Evan laughed. Emboldened by this as much as by the drink, Marianne said, "Are you gay?"

"You know I am, Marianne."

"I wanted to be sure. We've never discussed it. I'm a scientist, after all."

"You're an American. Leave nothing unsaid that can be shouted from rooftops."

Her fuzzy mind had gone back to Noah. "I failed my son, Evan."

"Rubbish. I told you, he'll sort himself out eventually. Just be prepared for the idea that it may take a direction you don't fancy."

Again that shadow in Evan's eyes. She didn't ask; he obviously didn't want to discuss it, and she'd snooped enough. Carefully she rose to leave, but Evan's next words stopped her.

"Also, Elizabeth is coming aboard tomorrow."

"*Elizabeth?* Why?"

"A talk with Smith about shore-side security. Someone tried a second attack at the sample collection site shore-side."

"Oh my God. Anybody hurt?"

"No. This time."

"Elizabeth is going to ask the Denebs to give her the energy-shield technology. She's been panting for it for border patrol ever since the *Embassy* first landed in the harbor. Evan, that would be a *disaster*. She's so focused on her job that she can't see what will happen if—no, when—the street finds its own uses for the tech, and it always does—" Who had said that? Some writer. She couldn't remember.

"Well, don't get your knickers in a twist. Elizabeth can ask, but that doesn't mean that Smith will agree."

"But he's so eager to find his 'clan'—God, it's so stupid! That Korean mitochondrial sequence, to take just one example, that turns up regularly in Norwegian fisherman, or that engineer in Minnesota who'd traced his ancestry back three hundred years without being able to account for the Polynesian mitochondrial signature he carries—*nobody* has a cure 'plan.' I mean, pure 'clan.'"

"Nobody on Earth, anyway."

"And even if they did," she barreled on, although all at once her words seemed to have become slippery in her mouth, like raw oysters, "There's no sig . . . sif . . . significant connection between two people with the same mitochondrial DNA than between any other two strangers!"

"Not to us," Evan said. "Marianne, go to bed. You're too tipsy, and we have work to do in the morning."

"It's not work that matters to protection against the shore cloud. Spore cloud. *Spore cloud.*"

"Nonetheless, it's work. Now go."

NOAH

Noah stood in a corner of the conference room, which held eleven people and two aliens. Someone had tried to make the room festive with a red paper tablecloth, flowers, and plates of tiny cupcakes. This had not worked. It was still a utilitarian, corporate-looking conference room, filled with people who otherwise would have no conceivable reason to be together at either a conference or a party. Lisa Guiterrez circulated among them: smiling, chatting, trying to put people at ease. It wasn't working.

Two young women, standing close together for emotional support. A middle-aged man in an Armani suit and Italian leather shoes. An unshaven man, hair in a dirty ponytail, who looked homeless but maybe only because he stood next to Well-Shod Armani. A woman carrying a plastic tote bag with a hole in one corner. And so on and so on. It was the sort of wildly mixed group that made Noah, standing apart with his back to a wall, think of worshippers in an Italian cathedral.

The thought brought him a strained smile. A man nearby, perhaps emboldened by the smile, sidled closer and whispered, "They *will* let us go back to New York, won't they?"

Noah blinked. "Why wouldn't they, if that's what you want?"

"I want them to offer us shields for the spore cloud! To take back with us to the city! Why else would I come here?"

"I don't know."

The man grimaced and moved away. But—why had he even come, if he suspected alien abduction or imprisonment or whatever? And why didn't he feel what Noah did? Every single one of the people in this room had caused in him the same shock of recognition as had Ambassador Smith. Every single one. And apparently no one else had felt it at all.

But the nervous man needn't have worried. When the party and its ceiling-delivered speeches of kinship and the invitation to make a longer visit aboard the *Embassy* were all over, everyone else left. They left looking relieved or still curious or satisfied or uneasy or disappointed (No energy shield offered! No riches!), but they all left, Lisa still chattering reassuringly. All except Noah.

Ambassador Smith came over to him. The Deneb said nothing, merely silently waited. He looked as if he were capable of waiting forever.

Noah's hands felt clammy. All those brief, temporary lives on sugarcane, each one shed like a snake skin when the drug wore off. No, not snake skins; that wasn't the right analogy. More like breadcrumbs tossed by Hansel and Gretel, starting in hope but vanishing before they could lead anywhere. The man with the dirty ponytail wasn't the only homeless one.

Noah said, "I want to know who and what you are."

The ceiling above Smith said, "Come with me to a genuine celebration."

A circular room, very small. Noah and Smith faced each other. The ceiling said, "This is an airlock. Beyond this space, the environment will be ours, not yours. It is not very different, but you are not used to our microbes and so must wear the energy suit. It filters air, but you may have some trouble breathing at first because the oxygen content of World is like Earth's at an altitude of 12,000 feet. If you feel nausea in the airlock, where we will stay for a few minutes, you may go back. The light will seem dim to you, the smells strange, and the gravity less than you are accustomed to by one-tenth. There are no built-in translators beyond this point, and we will speak our own language, so you will not be able to talk to us. Are you sure you wish to come?"

"Yes," Noah said.

"Is there anything you wish to say before you join your birthright clan?"

Noah said, "What is your name?"

Smith smiled. He made a noise that sounded like a trilled version of *meehao*, with a click on the end.

Noah imitated it.

Smith said, in trilling English decorated with a click, "Brother mine."

MARIANNE

Marianne was not present at the meeting between Elizabeth and Smith, but Elizabeth came to see her afterward. Marianne and Max were bent over the computer, trying to account for what was a mitochondrial anomaly or a sample contamination or a lab error or a program glitch. Or maybe something else entirely. Marianne straightened and said, "Elizabeth! How nice to—"

"You have to talk to him," Elizabeth demanded. "The man's an idiot!"

Marianne glanced at the security officer who had escorted Elizabeth to the lab. He nodded and went outside. Max said, "I'll just . . . uh . . . this can wait." He practically bolted, a male fleeing mother-daughter drama. Evan was getting some much-needed sleep; Gina had gone ashore to Brooklyn to see her parents for the first time in weeks.

"I assume," Marianne said, "you mean Ambassador Smith."

"I do. Does he know what's going on in New York? Does he even care?"

"What's going on in New York?"

Elizabeth instantly turned professional, calmer but no less intense. "We are less than nine months from passing through the spore cloud."

At least, Marianne thought, *she now accepts that much*.

"In the last month alone, the five boroughs have had triple the usual rate of arsons, ten demonstrations with city permits of which three turned violent, twenty-three homicides, and one mass religious suicide at the Church of the Next Step Forward in Tribeca. Wall Street has plunged. The Federal Reserve Bank on Liberty Street was occupied from Tuesday night until Thursday dawn by terrorists. Upstate, the governor's mansion has been attacked, unsuccessfully. The same thing is happening everywhere else. Parts of Beijing have been on fire for a week now. Thirty-six percent of Americans believe the Denebs brought the spore cloud with them, despite what astronomers say. If the ambassador gave us the energy shield, that might help sway the numbers in their favor. Don't you think the president and the UN have said all this to Smith?"

"I have no idea what the president and the UN have said, and neither do you."

"Mom—"

"Elizabeth, do you suppose that if what you just said is true and the ambassador said no to the president, that my intervention would do any good?"

"I don't know. You scientists stick together."

Long ago, Marianne had observed the many different ways people responded to unthinkable catastrophe. Some panicked. Some bargained. Some joked. Some denied. Some blamed. Some destroyed.

Some prayed. Some drank. Some thrilled, as if they had secretly awaited such drama their entire lives. Evidently, nothing had changed.

The people aboard the *Embassy* met the unthinkable with work, and then more work. Elizabeth was right that the artificial island had become its own self-contained, self-referential universe, every moment devoted to the search for something, anything, to counteract the effect of the spore cloud on mammalian brains. The Denebs, understanding how good hackers could be, blocked all Internet, television, and radio from the *Embassy*. Outside news came from newspapers or letters, both dying media, brought in the twice-daily mail sack and by the vendors and scientists and diplomats who came and went. Marianne had not paid attention.

She said to her enraged daughter, "The Denebs are not going to give you their energy shield."

"We cannot protect the UN without it. Let alone the rest of the harbor area."

"Then send all the ambassadors and translators home, because it's not going to happen. I'm sorry, but it's not."

"You're not sorry. You're on their side."

"It isn't a question of sides. In the wrong hands, those shields—"

"Law enforcement is the right hands!"

"Elizabeth, we've been over and over this. Let's not do it again. You know I have no power to get you an energy shield, and I haven't seen you in so long. Let's

not quarrel." Marianne heard the pleading note in her own voice. When, in the long and complicated road of parenthood, had she started courting her daughter's agreement, instead of the other way around?

"Okay, *okay*. How are you, Mom?"

"Overworked and harried. How are you?"

"Overworked and harried." A reluctant half-smile. "I can't stay long. How about a tour?"

"Sure. This is my lab."

"I meant of the *Embassy*. I've never been inside before, you know, and your ambassador—" somehow Smith had become Marianne's special burden "—just met with me in a room by the submarine bay. Can I see more? Or are you lab types kept close to your cages?"

The challenge, intended or not, worked. Marianne showed Elizabeth all over the Terran part of the *Embassy*, accompanied by a security officer whom Elizabeth ignored. Her eyes darted everywhere, noted everything. Finally she said, "Where do the Denebs live?"

"Behind these doors here. No one has ever been in there."

"Interesting. It's pretty close to the high-risk labs. And where is Noah?"

Yesterday's bitter scene with Noah, when he'd been so angry because she'd never told him he was adopted, still felt like an open wound. Marianne didn't want to admit to Elizabeth that she didn't know

where he'd gone. "He stays in the Terran visitors' quarters," she said, hoping there was such a place.

Elizabeth nodded. "I have to report back. Thanks for the Cook's tour, Mom."

Marianne wanted to hug her daughter, but Elizabeth had already moved off, heading toward the submarine bay, security at her side. Memory stabbed Marianne: a tiny Elizabeth, five years old, lips set as she walked for the first time toward the school bus she must board alone. It all went by so fast, and when the spore cloud hit, not even memory would be left.

She dashed away the stupid tears and headed back to work.

III: S minus 8.5 months

MARIANNE

The auditorium on the *Embassy* had the same thin, rice-paper-like walls as some of the other non-lab rooms, but these shifted colors like some of the more substantial walls. Slow, complex, subtle patterns in pale colors that reminded Marianne of dissolving oil slicks. Forty seats in rising semicircles faced a dais, looking exactly like a lecture room at her college. She had an insane desire to regress to undergraduate, pull out a notebook, and doodle in the margin. The seats were filled not with students chewing gum and texting each other, but with some of the planet's most eminent scientists. This was the first all-hands meeting of the scientists aboard. The dais was empty.

Three Denebs entered from a side door.

Marianne had never seen so many of them together at once. Oddly, the effect was to make them seem more alien, as if their minor differences from Terrans—the larger eyes, spindlier limbs, greater height—increased exponentially as their presence increased arithmetically. Was that Ambassador Smith and Scientist Jones? Yes. The third alien, shorter than the other two and somehow softer, said through the translator in the ceiling, "Thank you all for coming. We have three reports today, two from Terran teams and one from World. First, Dr. Manning." All three aliens smiled.

Terrence Manning, head of the Spore Team, took the stage. Marianne had never met him, Nobel Prize winners being as far above her scientific level as the sun above mayflies. A small man, he had exactly three strands of hair left on his head, which he tried to coax into a comb-over. Intelligence shone through his diffident, unusually formal manner. Manning had a deep, authoritative voice, a welcome contrast to the mechanical monotony of the ceiling.

From the aliens' bright-eyed demeanor, Marianne had half expected good news, despite the growing body of data on the ship's LAN. She was wrong.

"We have not," Manning said, "been able to grow the virus in cell cultures. As you all know, some viruses simply will not grow in vitro, and this seems to be one of them. Nor have we been able to infect monkeys—any breed of monkey—with spore disease. We will,

of course, keep trying. The better news, however, is that we have succeeded in infecting mice."

Good and bad, Marianne thought. Often, keeping a mouse alive was actually easier than keeping a cell culture growing. But a culture would have given them a more precise measure of the virus's cytopathic effect on animal tissue, and monkeys were genetically closer to humans than were mice. On the other hand, monkeys were notoriously difficult to work with. They bit, they fought, they injured themselves, they traded parasites and diseases, and they died of things they were not supposed to die from.

Manning continued, "We now have a lot of infected mice and our aerosol expert, Dr. Belsky, has made a determination of how much exposure is needed to cause spore disease in mice under laboratory conditions."

A graph flashed onto the wall behind Manning: exposure time plotted versus parts per million of spore. Beside Marianne, Evan's manicured fingers balled into a sudden fist. Infection was fast, and required a shockingly small concentration of virus, even for an airborne pathogen.

"Despite the infected mice," Manning went on, and now the strain in his voice was palpable, "we still have not been able to isolate the virus. It's an elusive little bugger."

No one laughed. Marianne, although this was not her field, knew how difficult it could be to find a virus even after you'd identified the host. They were

so tiny; they disappeared into cells or organs; they mutated.

"Basically," Manning said, running his hand over his head and disarranging his three hairs, "we know almost nothing about this pathogen. Not the *r nought*—for you astronomers, that is the number of cases that one case generates on average over the course of its infectious period—nor the incubation period nor the genome nor the morphology. What we do know are the composition of the coating encapsulating the virus, the transmission vector, and the resulting pathology in mice."

Ten minutes of data on the weird, unique coating on the "spores," a term even the scientists, who knew better, now used. Then Dr. Jessica Yu took Manning's place on the dais. Marianne had met her in the cafeteria and felt intimidated. The former head of the Special Pathogens branch of the National Center for Infectious Diseases in Atlanta, Jessica Yu was diminutive, fifty-ish, and beautiful in a severe, don't-mess-with-me way. Nobody ever did.

She said, "We are, of course, hoping that gaining insight into the mechanism of the disease in animals will help us figure out how to treat it in humans. These mice were infected three days ago. An hour ago they began to show symptoms, which we wanted all of you to see before . . . well, before."

The wall behind Jessica Yu de-opaqued, taking the exposure graphic with it. Or some sort of viewscreen now overlay the wall and the three mice now

revealed were someplace else in the *Embassy*. The mice occupied a large glass cage in what Marianne recognized as a BSL4 lab.

Two of the mice lay flat, twitching and making short whooshing sounds, much amplified by the audio system. No, not amplified—those were desperate gasps as the creatures fought for air. Their tails lashed and their front paws scrambled. They were, Marianne realized, trying to *swim* away from whatever was drowning them.

"In humans," Yu continued, "we would call this ARDS—Adult Respiratory Distress Syndrome, a catch-all diagnosis used when we don't know what the problem is. The mouse lung tissue is becoming heavier and heavier as fluid from the blood seeps into the lungs and each breath takes more and more effort. X-rays of lung tissue show 'white-out'—so much fluid in the lungs increasing the radiological density that the image looks like a snow storm. The viral incubation period in mice is three days. The time from onset of symptoms until death averages 2.6 hours."

The third mouse began to twitch.

Yu continued, her whole tiny body rigid: "As determined thus far, the infection rate in mice is about seventy-five percent. We can't, of course, make any assumptions that it would be the same in humans. Nor do we have any idea why mice are infected but monkeys are not. The medical data made available from the Deneb colonies do indicate similar metabolic

pathways to those of the mice. Those colonies had no survivors. Autopsies on the mice further indicate—"

A deep nausea took Marianne, reaching all the way from throat to rectum. She was surprised; her training was supposed to inure her. It did not. Before her body could disgrace her by retching or even vomiting, she squeezed past Evan with a push on his shoulder to indicate he should stay and hear the rest. In the corridor outside the auditorium she leaned against the wall, lowered her head between her knees, breathed deeply, and let shame overcome horror.

No way for a scientist to react to data—

The shame was not strong enough. It was her children that the horror brought: Elizabeth and Ryan and Noah, mouths open as they tried to force air into their lungs, wheezing and gasping, drowning where they lay . . . and Connie and the as-yet-unborn baby, her first grandchild. . . .

Stop. It's no worse for you than for anybody else.

Marianne stood. She dug the nails of her right hand into the palm of her left. But she could not make herself go back into the auditorium. Evan would have to tell her what other monstrosities were revealed. She made her way back to her lab.

Max sat at the computer, crunching data. Gina looked up from her bench. "Marianne—we found two more L7 donors."

"Good," Marianne said, went through the lab to her tiny office behind, and closed the door firmly.

What did it matter how many L7s she found for Smith? Earth was finished. Eight-and-a-half months left, and the finest medical and scientific brains on the planet had not even begun to find any way to mitigate the horror to come.

Gina knocked on the office door. "Marianne? Are you all right?"

Gina was the same age as Ryan, a young woman with her whole life still ahead of her. If she got that life. Meanwhile, there was no point in making the present even worse. Marianne forced cheerfulness into her voice. "Yes, fine. I'll be right out. Put on a fresh pot of coffee, would you please?"

NOAH

Noah stood with his clan and prepared to *lllathil*.

There was no word for it in English. Part dance, part religious ceremony, part frat kegger, and it went on for two days. Ten L7s stood in a circle, all in various stages of drunkenness. When the weird, atonal music (but after two months aboard the *Embassy* it no longer sounded weird or atonal to his ears) began, they weaved in and out, making precise figures on the floor with the red paint on their feet. Once the figures had been sacred, part of a primitive religion that had faded with the rapid growth of science nurtured by their planet's

lush and easy environment. The ritual remained. It affirmed family, always matrilineal on World. It affirmed connection, obligation, identity. Whenever the larger of World's moons was lined up in a certain way with the smaller, Worlders came together with their families and joyously made lllathil. Circles always held ten, and as many circles were made as a family needed. It didn't matter where you were on World, or what you were doing, when lllathil came, you were there.

His mother would never have understood.

The third morning, after everyone had slept off the celebration, came the second part of lllathil, which Marianne would have understood even less. Each person gave away one-fifth of everything he had earned or made since the last lllathil. He gave it, this "thumb" as it was jokingly called, to someone in his circle. Different clans gave different percentages and handled that in different ways, but some version of the custom mostly held over mostly monocultural World. The Denebs were a sophisticated race; such a gift involved transfers of the Terran equivalent of bank accounts, stock holdings, real estate. The Denebs were also human, and so sometimes the gift was made grudgingly, or with anger at a cousin's laziness, or resignedly, or with cheating. But it was made, and there wasn't very much cheating. Or so said Mee^haoi, formerly known to Noah as Smith, who'd told him so in the trilling and clicking language that Noah was trying so hard to master. "We teach

our children very intensively to follow our ways," Smith said wryly. "Of course, some do not. Some always are different."

"You said it, brother," Noah said in English, to Smith's total incomprehension.

Noah loved lllathil. He had very little—nothing, really—to give, but his net gain was not the reason he loved it. Nor was that the reason he studied the Worldese for hours every day, aided by his natural ear for languages. Once, in his brief and abortive attempt at college, Noah had heard a famous poet say that factual truth and emotional truth were not the same. "You have to understand with your belly," she'd said.

He did. For the first time in his life, he did.

His feet made a mistake, leaving a red toe print on the floor in the wrong place. No one chided him. Cliclimi, her old face wrinkling into crevasses and hills and dales, a whole topography of kinship, just laughed at him and reached out her skinny arm to fondly touch his.

Noah, not like that. Color in the lines!

Noah, this isn't the report card I expect of you.

Noah, you can't come with me and my friends! You're too little!

Noah, can't you do anything right?

When he'd danced until he could no longer stand (Cliclimi was still going at it, but she hadn't drunk as much as Noah had), he dropped onto a large cushion beside "Jones," whose real name he still couldn't pronounce. It had more trills than most, and

a strange tongue sound he could not reproduce at all. She was flushed, her hair unbound from its usual tight arrangement. Smaller than he was but stockier, her caramel-colored flesh glowed with exertion. The hair, rich dark brown, glinted in the rosy light. Her red tunic—everybody wore red for lllanthil—had hiked high on her thighs.

Noah heard his mother's voice say, "A hundred fifty thousand years is not enough time for a species to diverge." To his horror, he felt himself blush.

She didn't notice, or else she took it as warmth from the dancing. She said, "Do you have trouble with our gravity?"

Proud of himself that he understood the words, he said, "No. It small amount big of Earth." At least, he hoped that's what he'd said.

Apparently it was. She smiled and said something he didn't understand. She stretched luxuriously, and the tunic rode up another two inches.

What were the kinship taboos on sex? What were any of the taboos on sex? Not that Noah could have touched her skin-to-skin, anyway. He was encased, so unobtrusively that he usually forgot it was there, in the "energy suit" that protected him from alien microbes.

Microbes. Spores. How much time was left before the cloud hit Earth? At the moment it didn't seem important. (*Noah, you can't just pretend problems don't exist!* That had usually been Elizabeth.)

He said, "Can—yes, no?—make my—" Damn it,

what was the word for microbes? "—my inside like you? My inside spores?"

IV: S minus 6.5 months

MARIANNE

Gina had not returned from Brooklyn on the day's last submarine run. Marianne was redoing an entire batch of DNA amplification that had somehow become contaminated. Evan picked up the mail sack and the news dispatches. When he came into the lab, where Marianne was cursing at a row of beakers, he uncharacteristically put both hands on her shoulders. She looked at his face.

"What is it? Tell me quickly."

"Gina is dead."

She put a hand onto the lab bench to steady herself. "How?"

"A mob. They were frighteningly well armed, almost a small army. End-of-the-world rioters."

"Was Gina . . . did she. . . ?"

"A bullet, very quick. She didn't suffer, Marianne. Do you want a drink? I have some rather good Scotch."

"No. Thank you, but no."

Gina. Marianne could picture her so clearly, as if she still stood in the lab in the wrinkled white coat she always wore even though the rest of them did not. Her dark hair just touched with gray, her ruddy face calm. Brisk, pleasant, competent. . . . What else? Marianne hadn't known Gina very well. All at once, she wondered if she knew anyone, really knew them. Two of her children baffled her: Elizabeth's endemic anger, Noah's drifty aimlessness. Had she ever known Kyle, the man he was under the charming and lying surface, under the alcoholism? Evan's personal life was kept personal, and she'd assumed it was his British reticence, but maybe she knew so little about him because of her limitations, not his. With everyone else aboard the *Embassy*, as with her university department back home, she exchanged only scientific information or meaningless pleasantries. She hadn't seen her brother, to whom she'd never been close, in nearly two years. Her last close female friendship had been a decade ago.

Thinking this way felt strange, frightening. She was glad when Evan said, "Where's Max? I'll tell him about Gina."

"Gone to bed with a cold. It can wait until morning. What's that?"

Evan gave her a letter, addressed by hand. Marianne tore it open. "It's from Ryan. The baby was born, a month early but he's fine and so is she. Six pounds two ounces. They're naming him Jason William Jenner."

"Congratulations. You're a nan."

"A what?"

"Grand-mum." He kissed her cheek.

She turned to cling to him, without passion, in sudden need of the simple comfort of human touch. Evan smelled of damp wool and some cool, minty lotion. He patted her back. "What's all this, then?"

"I'm sorry, I—"

"Don't be sorry." He held her until she was ready to pull away.

"I think I should write to Gina's parents."

"Yes, that's right."

"I want to make them understand—" Understand what? That sometimes children were lost, and the reasons didn't necessarily make sense. But this reason did make sense, didn't it? Gina had died because she'd been aboard the *Embassy*, died as a result of the work she did, and right now this was the most necessary work in the entire world.

She had a sudden memory of Noah, fifteen, shouting at her, "You're never home! Work is all you care about!" And she, like so many beleaguered parents, had shouted back, "If it weren't for my work, we'd all starve!"

And yet, when the kids had all left home and she could work as much as she wanted or needed

without guilt, she'd missed them dreadfully. She'd missed the harried driving schedules—*I have to be at Jennifer's at eight* and *Soccer practice is moved up an hour Saturday!* She'd missed their electronics, cells and iPods and tablets and laptops, plugged in all of the old house's inadequate outlets. She'd missed the rainbow laundry in the basement, Ryan's red soccer shirts and Elizabeth's white jeans catastrophically dyed pink and Noah's yellow-and-black bumblebee costume for the second-grade play. All gone. When your children were small you worried that they would die and you would lose them, and then they grew up and you ended up losing the children they'd been, anyway.

Marianne pulled at the skin on her face and steeled herself to write to Gina's parents.

NOAH

There were three of them now. Noah Jenner, Jacqui Young, Oliver Pardo. But only Noah was undergoing the change.

They lounged this afternoon in the World garden aboard the *Embassy*, where the ceiling seemed to be open to an alien sky. A strange orange shone, larger than Sol and yet not shedding as much light, creating a dim glow over the three Terrans. The garden plants were all dark in hue ("To gather as much light as

possible," Mee^haoi had said), lush leaves in olive drab and pine and asparagus. Water trickled over rocks or fell in high, thin streams. Warmth enveloped Noah even through his energy suit, and he felt light on the ground in the lesser gravity. Some nearby flower sent out a strange, musky, heady fragrance on the slight breeze.

Jacqui, an energetic and enormously intelligent graduate student, had chosen to move into the alien section of the *Embassy* in order to do research. She was frank, with both Terrans and Denebs, that she was not going to stay after she had gathered the unique data on Deneb culture that would ensure her academic career. Smith said that was all right, she was clan and so welcome for as long as she chose. Noah wondered how she planned on even having an academic career after the spore cloud hit.

Oliver Pardo would have been given the part of geek by any film casting department with no imagination. Overweight, computer-savvy, fan of superheroes, he quoted obscure science fiction books sixty years old and drew endless pictures of girls in improbable costumes slaying dragons or frost giants. Socially inept, he was nonetheless gentle and sweet-natured, and Noah preferred his company to Jacqui's, who asked too many questions.

"Why?" she said.

"Why what?" Noah said, even though he knew perfectly well what she meant. He lounged back on the comfortable moss and closed his eyes.

"Why are you undergoing this punishing regime of shots just so you can take off your shield?"

"They're not shots," Noah said. Whatever the Denebs were doing to him, they did it by having him apply patches to himself when he was out of his energy suit and in an isolation chamber. This had happened once a week for a while now. The treatments left him nauseated, dizzy, sometimes with diarrhea, and always elated. There was only one more to go.

Jacqui said, "Shots or whatever, why do it?"

Oliver looked up from his drawing of a barbarian girl riding a lion. "Isn't it obvious?"

Jacqui said, "Not to me."

Oliver said, "Noah wants to become an alien."

"No," Noah said. "I was an alien. Now I'm becoming . . . not one."

Jacqui's pitying look said, *You need help*. Oliver shaded in the lion's mane. Noah wondered why, of all the Terrans of L7 mitochondrial haplotype, he was stuck with these two. He stood. "I have to study."

"I wish I had your fluency in Worldese," Jacqui said. "It would help my work so much."

So study it. But Noah knew she wouldn't, not the way he was doing. She wanted the quick harvest of startling data, not . . . whatever it was he wanted.

Becoming an alien. Oliver was more correct than Noah's flip answer. And yet Noah had been right, too, which was something he could never explain to anyone, least of all his mother. Whom he was supposed to visit this morning, since she could not come to him.

All at once Noah knew that he was not going to keep that appointment. Although he flinched at the thought of hurting Marianne, he was not going to leave the World section of the *Embassy*. Not now, not ever. He couldn't account for this feeling, so strong that it seemed to infuse his entire being, like oxygen in the blood. But he had to stay here, where he belonged. Irrational, but—as Evan would have said—there it was, mustn't grumble, at least it made a change, no use going on about it.

He had never liked Evan.

In his room, Noah took pen and a pad of paper to write a note to his mother. The words did not come easy. All his life he had disappointed her, but not like this.

Dear Mom—I know we were going to get together this afternoon but—

Dear Mom—I wish I could see you as we planned but—

Dear Mom—We need to postpone our visit because Ambassador Smith has asked me if this afternoon I would—

Noah pulled at the skin on his face, realized that was his mother's gesture, and stopped. He looked longingly at the little cubes that held his language lessons. As the cube spoke Worldese, holofigures in the cube acted out the meaning. After Noah repeated each phrase, it corrected his pronunciation until he got it right.

"My two brothers live with my mother and me in

this dwelling," a smiling girl said in the holocube, in Worldese. Two boys, one younger than she and one much older, appeared beside her with a much older woman behind them, all four with similar features, a shimmering dome behind them.

"My two brothers live with my mother and me in this dwelling," Noah repeated. The Worldese tenses were tricky; these verbs were the ones for things that not only could change, but could change without the speaker's having much say about events. A mother could die. The family could be chosen for a space colony. The older brother could marry and move in with his wife's family.

Sometimes things were beyond your control and you had no real choice.

Dear Mom—I can't come. I'm sorry. I love you. Noah

MARIANNE

The work—anybody's work—was not going well.

It seemed to be proceeding at an astonishing pace, but Marianne—and everyone else—knew that was an illusion. She sat in the auditorium for the monthly report, Evan beside her. This time, no Denebs were present—why not? She listened to Terence Manning enumerate what under any other circumstances would have been incredibly rapid triumphs.

"We have succeeded in isolating the virus," Manning

said, "although not in growing it in vitro. After isolation, we amplified it with the usual polymerase processes. The virus has been sequenced and—only a few days ago!—captured on an electromicrograph image, which, as most of you know, can be notoriously difficult. Here it is."

A graphic appeared on the wall behind Manning: fuzzy concentric circles blending into each other in shades of gray. Manning ran his hand over his head, now completely bald. Had he shaved his last three hairs, Marianne wondered irrelevantly. Or had they just given up and fallen out from stress?

"The virion appears to be related to known paramyxoviruses, although the gene sequence, which we now have, does not exactly match any of them. It is a negative-sense single-stranded RNA virus. Paramyxoviruses, to which it may or may not be directly related, are responsible for a number of human and animal diseases, including parainfluenza, mumps, measles, pneumonia, and canine distemper. This family of viruses jumps species more easily than any other. From what we have determined so far, it most closely resembles both Hendra and Nipah viruses, which are highly contagious and highly virulent.

"The genome follows the paramyxovirus 'Rule of Six,' in that the total length of the genome is almost always a multiple of six. The spore virus consists of twenty-one genes with 21,645 base pairs. That makes it a large virus, but by no means the largest we know. Details of sequence, structure, envelope

proteins, etc., can be found on the LAN. I want to especially thank Drs. Yu, Sedley, and Lapka for their valuable work in identifying *Respirovirus sporii*."

Applause. Marianne still stared at the simple, deadly image behind Manning. An unwelcome thought had seized her: the viral image looked not unlike a fuzzy picture of a not-too-well-preserved trilobite. Trilobites had been the dominant life-form on Earth for three hundred million years and comprised more than ten thousand species. All gone now. Humans could be gone, too, after a much briefer reign.

But we survived so much! The Ice Age, terrible predators, the "bottleneck event" of seventy thousand years ago that reduced *Homo sapiens* to mere thousands. . . .

Manning was continuing. This was the bad news. "However, we have made little progress in figuring out how to combat *R. sporii*. Blood from the infected mice has been checked against known viruses and yielded no seriological positives. None of our small number of antiviral drugs was effective, although there was a slight reaction to ribavirin. That raises a further puzzle, since ribavirin is mostly effective against Lassa fever, which is caused by an arenavirus, not a paramyxovirus." Manning tried to smile; it was not a success. "So, the mystery deepens. I wish we had more to report."

Someone asked, "Are the infected mice making antibodies?"

"Yes," Manning said, "and if we can't manage to develop a vaccine, this is our best possible path to a post-exposure treatment, following the MB-003 model developed for Ebola. For you astronomers—and please forgive me if I am telling you things you already know—a successful post-exposure treatment for Ebola in nonhuman primates was developed two years ago, using a cocktail of monoclonal antibodies. It was the work of a partnership between American industry and government agencies. When administered an hour after infection, MB-003 yields a one hundred percent survival rate. At forty-eight hours, the survival rate is two-thirds. MB-003 was initially developed in a mouse model and then produced in plants. The work took ten years. It has not, of course, been tested in humans."

Ten years. The *Embassy* scientists had less than five months left. Ebola had previously been studied since its first outbreak in 1976. And the biggie: *It has not, of course, been tested in humans*. In whom it might, for all anyone knew, not even work.

Maybe the Denebs knew faster ways to produce a vaccine from antibodies, exponentially increase production, and distribute the results. But the aliens weren't even at this meeting. They had surely been given all this information already, but even so—

—How the hell could the aliens be anyplace more important than this?

V: S minus 3.5 months

MARIANNE

Marianne felt ridiculous. She and Evan leaned close over the sink in the lab. Water gushed full-strength from the tap, making noise that, she hoped, covered their words. The autoclave hummed; a Bach concerto played tinnily on the computer's inadequate speaker. The whole thing felt like a parody of a bad spy movie.

They had never been able to decide if the labs, if everywhere on the *Embassy*, were bugged. Evan had said yes, of course, don't be daft. Max, with the hubris of the young, had said no because his computer skills would have been able to detect any surveillance. Marianne and Gina had said it was irrelevant since both their work and their personal lives were so transparent. In addition, Marianne had disliked the

implication that the Denebs were not their full and open partners. Gina had said—

Gina. Shot down, her life ended just as Jason William Jenner's had begun. And for how long? Would Marianne even get to see her grandson before everything was as over as Gina's life?

Dangerous to think this way. Their work on the *Embassy* was a thin bridge laid across a pit of despair, the same despair that had undoubtedly fueled Gina's killers.

"You know what has to happen," Marianne whispered. "Nobody's saying it aloud, but without virus replication in human bodies, we just can't understand the effect on the immune system and we're working blindly. Mice aren't enough. Even if we could have infected monkeys, it wouldn't be enough. We have to infect volunteers."

Evan stuck his finger into the flow of water, which spattered in bright drops against the side of the sink. "I know. *Everyone* knows. The request has been made to the powers that be."

"How do you know that?"

"I talk to people on the other teams. You know the laws against experimentation on humans unless there have first been proper clinical trials that—"

"Oh, fuck proper trials, this is a crisis situation!"

"Not enough people in power are completely convinced of that. You haven't been paying attention to the bigger picture, Marianne. The Public Health Service isn't even gearing up for mass inoculation

or protection—Robinson is fighting it with claw and tusk. FEMA is divided and there's almost anarchy in the ranks. Congress just filibusters on the whole topic. And the president just doesn't have the votes to get much of anything done. Meanwhile, the masses riot or flee or just pretend the whole thing is some sort of hoax. The farther one gets from New York, the more the conspiracy theorists don't even believe there are aliens on Earth at all."

Marianne, still standing, pulled at the skin on her face. "It's all so frustrating. And the work we're doing here—you and I and Max and Gina—" her voice faltered "—is pointless. It really is. Identifying members of Smith's so-called clan? Who cares? I'm going to volunteer myself to be infected."

"They won't take you."

"If—"

"The only way that could happen is in secret. If a subgroup on the Spore Team decided the situation was desperate enough to conduct an unauthorized experiment."

She studied his face. In the biology department at the university, Evan had always been the one who knew how to obtain travel money for a conference, interviews with Nobel Prize winners, an immediate appointment with the dean. He had the knack, as she did not, for useful connections. She said, "You know something."

"No. I don't. Not yet."

"Find out."

He nodded and turned off the water. The music crescendoed: Brandenburg Concerto #2, which had gone out into space on the "golden record" inside *Voyager 1*.

The secret experiment turned out to be not all that secret.

Evan followed the rumors. Within a day he had found a lab tech in the Biology Group who knew a scientist in the Spore Group who referred him, so obliquely that Evan almost missed it, to a security officer. Evan came to Marianne in her room, where she'd gone instead of eating lunch. He stood close to her and murmured in her ear, ending with, "They'll let us observe. You—what's that, then?"

The last sentence was said in a normal voice. Evan gazed at the piece of paper in Marianne's hands. She had been looking at it since she found it under her door.

"Another note from Noah. He isn't . . . he can't . . . Evan, I need to go ashore to see my new grandchild."

Evan blinked. "Your new grandchild?"

"Yes. He's three months old already and I haven't even seen him."

"It's not safe to leave the *Embassy* now. You know that."

"Yes. But I need to go."

Gently Evan took the note from her and read it. Marianne saw that he didn't really understand.

Young, childless, orphaned . . . how could he? Noah had not forgiven her for never telling him that he was adopted. That must be why he said he might not ever see her again; no other reason made sense. Although maybe he would change his mind. Maybe in time he would forgive her, maybe he would not, maybe the world would end first. Before any of those things happened, Marianne had to see little Jason. She had to affirm what family ties she had, no matter how long she had them. Or anyone had them.

She said, "I need to talk to Ambassador Smith. How do I do that?"

He said, "Do you want me to arrange it?"

"Yes. Please. For today."

He didn't mention the backlog of samples in the lab. No one had replaced Gina. As family trees of the L7 haplogroup were traced in the matrilineal line, more and more of Smith's "clan" were coming aboard the *Embassy*. Marianne suspected they hoped to be shielded or transported when the spore cloud hit. She also suspected they were right. The Denebs were . . .

. . . were just as insistent on family connections as she was, risking her life to see Ryan, Connie, and the baby.

Well.

A helicopter flew her directly from the large pier outside the *Embassy* (so that's what it was for). When Marianne had last been outside, autumn was just

ending. Now it was spring, the reluctant Northern spring of tulips and late frosts, cherry blossoms and noisy frogs. The Vermont town where Connie's parents lived, and to which Ryan had moved his family for safety, was less than twenty miles from the Canadian border. The house was a pleasant brick faux-Colonial set amid bare fields. Marianne noted, but did not comment on, the spiked chain-link fence around the small property, the electronic-surveillance sticker on the front door, and the large Doberman whose collar Ryan held in restraint. He had hastened home from his field work when she phoned that she was coming.

"Mom! Welcome!"

"We're so glad you're here, Marianne," Connie said warmly. "Even though I suspect it isn't us you came to see!" She grinned and handed over the tiny wrapped bundle.

The baby was asleep. Light-brown fuzz on the top of his head, silky skin lightly flushed with pink, tiny pursed mouth sucking away in an infant dream. He looked so much as Ryan had that tears pricked Marianne's eyes. Immediately she banished them: no sorrow, neither nostalgic nor catastrophic, was going to mar this occasion.

"He's beautiful," she said, inadequately.

"Yes!" Connie was not one of those mothers who felt obliged to disclaim praise of her child.

Marianne held the sleeping baby while coffee was produced. Connie's parents were away, helping

Connie's sister, whose husband had just left her and whose three-year-old was ill. This was touched on only lightly. Connie kept the conversation superficial, prattling in her pretty voice about Jason, about the dog's antics, about the weather. Marianne followed suit, keeping to herself the thought that, after all, she had never heard Connie talk about anything but light and cheerful topics. She must have more to her than that, but not in front of her mother-in-law. Ryan said almost nothing, sipping his coffee, listening to his wife.

Finally Connie said, "Oh, I've just been monopolizing the conversation! Tell us about life aboard the *Embassy*. It must be so fascinating!"

Ryan looked directly at Marianne.

She interpreted the look as a request to keep up the superficial tone. Ryan had always been as protective of Connie as of a pretty kitten. Had he deliberately chosen a woman so opposite to his mother because Marianne had always put her work front and center? Had Ryan resented her for that as much as Noah had?

Pushing aside these disturbing thoughts, she chatted about the aliens. Connie asked her to describe them, their clothes, her life there. Did she have her own room? Had she been able to decorate it? Where did the humans eat?

"We're *all* humans, Terrans and Denebs," Marianne said.

"Of course," Connie said, smiling brilliantly. "Is the food good?"

Talking, talking, talking, but not one question about her work. Nor about the spore cloud, progress toward a vaccine, anything to indicate the size and terror of the coming catastrophe. Ryan did ask about the *Embassy*, but only polite questions about its least important aspects: how big it was, how it was laid out, what was the routine. Safe topics.

Just before a sense of unreality overwhelmed Marianne, Ryan's cell rang, and the ringing woke the baby, who promptly threw up all over Marianne.

"Oh, I'm sorry!" Connie said. "Here, give him to me!"

Ryan, making gestures of apology, took his cell into the kitchen and closed the door. Connie reached for a box of Wet Ones and began to wipe Jason's face. She said, "The bathroom is upstairs to the left, Marianne. If you need to, I can loan you something else to wear."

"It would have to be one of your maternity dresses," Marianne said. It came out more sour than she'd intended.

She went upstairs and cleaned baby vomit off her shirt and jeans with a wet towel. The bathroom was decorated in a seaside motif, with hand towels embroidered with sailboats, soap shaped like shells, blue walls painted with green waves and smiling dolphins. On top of the toilet tank, a crocheted cylinder decorated like a buoy held a spare roll of toilet paper.

Keeping chaos at bay with cute domesticity. Good plan. And then: *Stop it, Marianne.*

Using the toilet, she leafed idly through magazines stacked in a rustic basket. *Good Housekeeping*, *Time*, a Macy's catalogue. She pulled out a loose paper with full-color drawings:

> HOW TO TELL PURPLE LOOSESTRIFE FROM NATIVE PLANTS
> DON'T BE FOOLED BY LOOK-ALIKES!
>
> Purple loosestrife leaves are downy with smooth edges. Although usually arranged opposite each other in pairs which alternate down the stalk at 90-degree angles, the leaves may sometimes appear in groups of three. The leaves lack teeth. The flowers, which appear in mid-to-late summer, form a showy spike of rose-purple, each with five to seven petals. The stem is stiff, four-sided, and may appear woody at the base of larger plants, which can reach ten feet tall. Average height is four feet. Purple loosestrife can be distinguished from the native winged loosestrife (*Lythrum alatum*), which it most closely resembles, by its generally larger size, opposite leaves, and more closely placed flowers. It may also be confused with blue vervain (pictured below), which has . . .

At the bottom of the page, someone—presumably

Ryan—had hand-drawn in purple ink three stylized versions of a loosestrife spike, then circled one. To Marianne it looked like a violet rocket ship unaccountably sprouting leaves.

Downstairs, Jason had been cleaned up and changed. Marianne played with him the limited games available for three-month-old babies: peek-a-boo, feetsies go up and down, where did the finger go? When he started to fuss and Connie excused herself to nurse him, Marianne said her good-byes and went out to the helicopter waiting in a nearby field. Neighbors had gathered around it, and Ryan was telling them—what? The neighbors looked harmless, but how could you tell? Always, Gina was on her mind. She hugged Ryan fiercely.

As the copter lifted and the house, the town, the countryside got smaller and smaller, Marianne tried not to think of what a failure the visit had been. Yes, she had seen her grandchild. But whatever comfort or connection that had been supposed to bring her, it hadn't. It seemed to her, perhaps irrationally, that never had she felt so alone.

NOAH

When Noah woke, he instantly remembered what day it was. For a long moment, he lay still, savoring the knowledge like rich chocolate on the tongue.

Then he said good-bye to his room. He would never sleep here, out of his energy suit, again.

Over the months, he had made the room as World as he could. A sleeping mat, thin but with as much give as a mattress, rolled itself tightly as soon as he sprang up and into the tiny shower. On the support wall he had hung one of Oliver's pictures—not a half-dressed barbarian princess this time, but a black-and-white drawing of plants in the World garden. The other walls, which seemed thin as rice paper but somehow kept out sound, had been programmed, at Noah's request, with the subtly shifting colors that the Worlders favored for everything except family gatherings. Color was extremely important to Worlders, and so to Noah. He was learning to discern shades that had once seemed all the same. *This* blue for mourning; *this* blue for adventure; *this* blue for loyalty. He had discarded all his Terran clothes. How had he ever stood the yellow polo shirt, the red hoodie? Wrong, wrong.

Drying his body, he rehearsed his request to Mee^haoi (rising inflection in the middle, click at the end—Noah loved saying his name).

Breakfast, like all World meals, was communal, a time to affirm ties. Noah had already eaten in his room; the energy suit did not permit the intake of food. Nonetheless, he took his place in the hierarchy at the long table, above Oliver and Jacqui and below everyone else. That was just. Family

solidarity rested on three supports: inclusion, rank, and empathy. A triangle was the strongest of all geometrical figures.

"G'morning," Oliver said, yawning. He was not a morning person, and resented getting up for a breakfast he would not eat until much later.

"I greet you," Noah said in World. Oliver blinked.

Jacqui, quicker, said, "Oh, today is the day, is it? Can I be there?"

"At the ceremony? No, of course not!" Noah said. She should have known better than to even make the request.

"Just asking," Jacqui said. "Doesn't hurt to ask."

Yes, it does. It showed a lack of respect for all three supports in the triangle. Although Noah had not expected any more of Jacqui.

He did expect it of the three Terrans who took their places below Oliver. Isabelle Rhinehart; her younger sister, Kayla; and Kayla's son had come into the World section of the *Embassy* only a week ago, but already the two women were trying to speak Worldese. The child, Austin, was only three—young enough to grow up trilling and clicking Worldese like a native. Noah gazed with envy at the little boy, who smiled shyly and then crawled onto his mother's lap.

But they could not hold Noah's interest long. This was the day!

His stomach growled. He'd been too excited to eat much of the food delivered earlier to his room. And truthfully, the vegetarian World diet was not exciting.

But he would learn to like it. And what a small price to pay for . . . *everything*.

The ceremony took place in the same room, right after breakfast. The other Terrans had left. Mee^haoi changed the wall program. Now instead of subtly shifting greens, the thin room dividers pulsed with the blue of loyalty alternating with the color of the clan of Mee^haoi.

Noah knelt in the middle of the circle of Worlders, facing Mee^haoi, who held a long blue rod. *Now I dub thee Sir Noah*. . . . Noah hated, completely hated, that his mind threw up that stupid thought. This was nothing like a feudal knighting. It was more like a baptism, washing him clean of his old self.

Mee^haoi sang a verse of what he had been told was the family inclusion song, with everyone else echoing the chorus. Noah didn't catch all the trilling and clicking words, but he didn't have to. Tears pricked his eyes. It seemed to him that he had never wanted anything this much in life, had never really wanted anything at all.

"Stand, brother mine," Mee^haoi said.

Noah stood. Mee^haoi did something with the rod, and the energy shield dissolved around Noah.

Not only a baptism—an operation.

The first breath of World air almost made him vomit. No, the queasiness was excitement, not the air. It tasted strange, and with the second panicky breath he felt he wasn't getting enough of it. But he knew that was just the lower oxygen content.

The *Embassy* was at sea level; the O_2 concentration of World matched that at 12,000 feet. His lungs would adapt. His marrow would produce more red corpuscles. The Worlders had evolved for this; Noah would evolve, too.

The air smelled strange.

His legs buckled slightly, but before Llaa^mohi, whom he had once known as Jones, could step toward him, Noah braced himself and smiled. He was all right. He was here. He was—

"Brother mine" went around the circle, and then the formalities were over and they all hugged him, and for the first time in 150,000 years, Terran skin touched the skin of humans from the stars.

MARIANNE

The security officer met Marianne and Evan in their lab and conducted them to a euchre game in the observation area outside the BSL4 lab.

From the first time she'd come here, Marianne had been appalled by the amateurishness of the entire setup. Granted, this was a bunch of scientists, not the CIA. Still, the Denebs had to wonder why euchre—or backgammon or chess or Monopoly, it varied—was being played here instead of at one of the comfortable Commons or cafeterias. Why two scientists were constantly at work in the negative-pressure lab even

when they seemed to have nothing to do. Why the euchre players paid more attention to the screens monitoring the scientists' vitals than to the card game.

Dr. Julia Namechek and Dr. Trevor Lloyd. Both young, strong, and self-infected with spore disease. They moved around the BSL4 lab in full space suits, breathing tubes attached to the air supply in the ceiling. Surely the Denebs' energy suits would be better for this kind of work, but the suits had not been offered to the Terrans.

"When?" Marianne murmured, playing the nine of clubs.

"Three days ago," said a physician whose name Marianne had not caught.

Spore disease (the name deliberately unimaginative, non-inflammatory) had turned up in mice after three days. Marianne was not a physician, but she could read a vitals screen. Neither Namechek nor Lloyd, busily working in their space suits behind glass, showed the slightest signs of infection. This was, in fact, the third time that the two had tried to infect themselves by breathing in the spores. Each occasion had been preceded by weeks of preparation. Those times, nothing had happened, either, and no one knew why.

Physicians experimenting on themselves were not unknown in research medicine. Edward Jenner had infected himself—and the eight-year-old son of his gardener—with cowpox to develop the smallpox

vaccine. Jesse William Lazear infected himself with yellow fever from mosquitoes, in order to confirm that mosquitoes were indeed the transmission vector. Julio Barrera gave himself Argentine hemorrhagic fever; Barry Marshall drank a solution *H. pylori* to prove the bacterium caused peptic ulcers; Pradeep Seth injected himself with an experimental vaccine for HIV.

Marianne understood the reasons for the supposed secrecy of this experiment. The newspapers that came in on the mail runs glowed luridly with speculations about human experimentation aboard the *Embassy*. Journalists ignited their pages with "Goebbels," "Guatemalan syphilis trials," "Japanese Unit 731." And those were the mainstream journalists. The tabloids and fringe papers invented so many details about Deneb atrocities on humans that the newsprint practically dripped with blood and body parts. The online news sources were, if anything, even worse. No, such "journalists" would never believe that Drs. Namechek and Lloyd had given spore disease to themselves and without the aliens' knowing it.

Actually, Marianne didn't believe that, either. The Denebs were too intelligent, too technologically advanced, too careful. They *had* to know this experiment was going on. They had to be permitting it. No matter how benign and peaceful their culture, they were human. Their lack of interference was a way of ensuring CYA deniability.

"Your turn, Dr. Jenner," said Seyd Sharma, a very

formal microbiologist from Mumbai. He was the only player wearing a suit.

"Oh, sorry," Marianne said. "What's trump again?"

Evan, her partner, said, "Spades. Don't trump my ace again."

"No table talk, please," Sharma said.

Marianne studied her hand, trying to remember what had been played. She had never been a good card player. She didn't like cards. And there was nothing to see here, anyway. Evan could bring her the results, if any, of the clandestine experiment. It was possible that the two scientists had not been infected, after all—not this time nor the previous two. It was possible that the pathogen had mutated, or just hadn't taken hold in these two particular people, or was being administered with the wrong vector. Stubbins Firth, despite heroic and disgusting measures, had never succeeded in infecting himself with yellow fever because he never understood how it was transmitted. Pathogen research was still part art, part luck.

"I fold," she said, before she remembered that "folding" was poker, not euchre. She tried a weak smile. "I'm very tired."

"Go to bed, Dr. Jenner," said Seyd Sharma. Marianne gave him a grateful look, which he did not see as he frowned at his cards. She left.

Just as she reached the end of the long corridor leading to the labs, the door opened and a security guard hurried through, face twisted with some strong emotion. Her heart stopped. What fresh disaster now?

She said, "Did anything—" but before she could finish the question he had pushed past her and hurried on.

Marianne hesitated. Follow him to hear the news or wait until—

The lab exploded.

Marianne was hurled to the floor. Walls around her, the tough but thin membrane-like walls favored by the Denebs, tore. People screamed, sirens sounded, pulsing pain tore through Marianne's head like a dark, viscous tsunami.

Then everything went black.

She woke alone in a room. Small, white, windowless, with one clear wall, two doors, a pass-through compartment. Immediately, she knew, even before she detected the faint hum of blown air: a quarantine room with negative pressure. The second door, locked, led to a BSL4 operating room for emergency procedures and autopsies. The explosion had exposed her to spores from the experimental lab.

Bandages wreathed her head; she must have hit it when she fell, got a concussion, and needed stitches. Nothing else on her seemed damaged. Gingerly she sat up, aware of the IV tube and catheter and pulse oximeter, and waiting for the headache. It was there, but very faint. Her movement set off a faint gong somewhere and Dr. Ann Potter, a physician whom Marianne knew slightly, appeared on the other side of the clear glass wall.

The doctor said, her voice coming from the ceiling as if she were just one more alien, "You're awake. What do you feel?"

"Headache. Not terrible. What . . . what happened?"

"Let me ask you some questions first." She was asked her name, the date, her location, the name of the president—

"Enough!" Marianne said. "I'm fine! *What happened*?" But she already knew. Hers was the only bed in the quarantine room.

Dr. Potter paid her the compliment of truth. "It was a suicide bomber. He—"

"The others? Evan Blanford?"

"They're all dead. I'm sorry, Dr. Jenner."

Evan. Dead.

Seyd Sharma, with his formal, lilting diction. Julia Namechek, engaged to be married. Trevor Lloyd, whom everyone said would win a Nobel someday. The fourth euchre player, lab tech Alyssa Rosert—all dead.

Evan. Dead.

Marianne couldn't process that, not now. She managed to say, "Tell me. All of it."

Ann Potter's face creased with emotion, but she had herself under control. "The bomber was dressed as a security guard. He had the explosive—I haven't heard yet what it was—in his stomach or rectum, presumably encased to protect it from body fluids. Autopsy showed that the detonator, ceramic so that it got through all our metal detectors, was probably

embedded in a tooth, or at least somewhere in his mouth that could be tongued to go off."

Marianne pictured it. Her stomach twisted.

Dr. Potter continued, "His name was Michael Wendl and he was new but legitimately aboard, a sort of mole, I guess you'd call it. A manifesto was all over the Internet an hour after the explosion and this morning—"

"This morning? How long have I been out?"

"Ten hours. You had only a mild concussion but you were sedated to stitch up head lacerations, which of course we wouldn't ordinarily do but this was complicated because—"

"I know," Marianne said, and marveled at the calm in her voice. "I may have been exposed to the spores."

"You *have* been exposed, Marianne. Samples were taken. You're infected."

Marianne set that aside, too, for the moment. She said, "Tell me about the manifesto. What organization?"

"Nobody has claimed credit. The manifesto was about what you'd expect: Denebs planning to kill everyone on Earth, all that shit. Wendl vetted okay when he was hired, so speculation is that he was a new recruit to their cause. He was from somewhere upstate and there's a lot of dissent going on up there. But the thing is, he got it wrong. He was supposed to explode just outside the Deneb section of the *Embassy*, not the research labs. His organization, whatever it was, knew something about the layout of the *Embassy* but not enough. Wendl was supposed

to be restricted to sub-bay duty. It's like someone who'd had just a brief tour had told him where to go, but either they remembered wrong or he did."

Marianne's spine went cold. *Someone who'd had just a brief tour . . .*

"You had some cranial swelling after the concussion, Marianne, but it's well under control now."

Elizabeth.

No, not possible. Not thinkable.

"You're presently on a steroid administered intravenously, which may have some side effects I'd like you to be aware of, including wakefulness and—"

Elizabeth, studying everything during her visit aboard the *Embassy*: *"Where do the Denebs live?" "Behind these doors here. No one has ever been in there." "Interesting. It's pretty close to the high-risk labs. "*

"Marianne, are you listening to me?"

Elizabeth, furiously punching the air months ago: *"I don't believe it, not any of it. There are things they aren't telling us!"*

"Marianne?"

Elizabeth, grudgingly doing her duty to protect the aliens but against her own inclinations. Commanding a critical section of the Border Patrol, a member of the joint task force that had access to military-grade weapons. In an ideal position to get an infiltrator aboard the floating island.

"Marianne! *Are* you listening to me?"

"No," Marianne said. "I have to talk to Ambassador Smith!"

"Wait, you can't just—"

Marianne had started to heave herself off the bed, which was ridiculous because she couldn't leave the quarantine chamber anyway. A figure appeared on the other side of the glass barrier, behind Dr. Potter. The doctor, following Marianne's gaze, turned, and gasped.

Noah pressed close to the glass. An energy shield shimmered around him. Beneath it he wore a long tunic like Smith's. His once-pale skin now shone coppery under his black hair. But most startling were his eyes: Noah's eyes, and yet not. Bigger, altered to remove as much of the skin and expose as much of the white as possible. Within that large, alien-sized expanse of white, his irises were still the same color as her own, an un-alien light gray flecked with gold.

"Mom," he said tenderly. "Are you all right?"

"Noah—"

"I came as soon as I heard. I'm sorry it's been so long. Things have been . . . happening."

It was still Noah's voice, coming through the energy shield and out of the ceiling with no alien inflection, no trill or click. Marianne's mind refused to work logically. All she could focus on was his voice: He was too old. He would never speak English as anything but a Middle Atlantic American, and he would never speak Worldese without an accent.

"Mom?"

"I'm fine," she managed.

"I'm so sorry to hear about Evan."

She clasped her hands tightly together on top of

the hospital blanket. "You're going. With the aliens. When they leave Earth."

"Yes."

One simple word. No more than that, and Marianne's son became an extraterrestrial. She knew that Noah was not doing this in order to save his life. Or hers, or anyone's. She didn't know why he had done it. As a child, Noah had been fascinated by superheroes, aliens, robots, even of the more ridiculous kind where the science made zero sense. Comic books, movies, TV shows—he would sit transfixed for hours by some improbable human transformed into a spider or a hulk or a sentient hunk of metal. Did Noah remember that childish fascination? She didn't understand what this adopted child, this beloved boy she had not borne, remembered or thought or desired. She never had.

He said, "I'm sorry."

She said, "Don't be," and neither of them knew exactly what he was apologizing for in the first place, nor what she was excusing him from. After that, Marianne could find nothing else to say. Of the thousands of things she could have said to Noah, absolutely none of them rose to her lips. So finally she nodded.

Noah blew her a kiss. Marianne did not watch him go. She couldn't have borne it. Instead she shifted her weight on the bed and got out of it, holding on to the bedstead, ignoring Ann Potter's strenuous objections on the other side of the glass.

She had to see Ambassador Smith, to tell him about Elizabeth. The terrorist organization could strike again.

As soon as she told Smith, Elizabeth would be arrested. *Two children lost—*

No, don't think of it. Tell Smith.

But—*wait*. Maybe it hadn't been Elizabeth. Surely others had had an unauthorized tour of the ship? And now, as a result of the attack, security would be tightened. Probably no other saboteur could get through. Perhaps there would be no more supply runs by submarine, no more helicopters coming and going on the wide pier. Time was so short—maybe there were enough supplies aboard already. And perhaps the Denebs would use their unknowable technology to keep the *Embassy* safer until the spore cloud hit, by which time, of course, the aliens would have left. There were only three months left. Surely a second attack inside the *Embassy* couldn't be organized in such a brief time! Maybe there was no need to name Elizabeth at all.

The room swayed as she clutched the side of the bed.

Ann Potter said, "If you don't get back into bed right now, Marianne, I'm calling security."

"Nothing is secure, don't you know that, you silly woman?" Marianne snapped.

Noah was lost to her. Evan was dead. Elizabeth was guilty.

"I'm sorry," she said. "I'll get back in bed." What

was she even doing, standing up? She couldn't leave. She carried the infection inside her body. "But I . . . I need to see Ambassador Smith. Right now, here. Please have someone tell him it's the highest possible priority. Please."

NOAH

The visit to his mother upset Noah more than he'd expected. She'd looked so small, so fragile in her bed behind the quarantine glass. Always, his whole life, he'd thought of her as large, towering over the landscape like some stone fortress, both safe and formidable. But she was just a small, frightened woman who was going to die.

As were Elizabeth, Ryan and Connie and their baby, Noah's last girlfriend, Emily, his childhood buddies Sam and Davey, Cindy and Miguel at the restaurant—all going to die when the spore cloud hit. Why hadn't Noah been thinking about this before? How could he be so selfish about concentrating on his delight in his new clan that he had put the rest of humanity out of his mind?

He had always been selfish. He'd known that about himself. Only before now, he'd called it "independent."

It was a relief to leave the Terran part of the *Embassy*, with its too-heavy gravity and glaring light.

The extra rods and cones that had been inserted into Noah's eyes made them sensitive to such terrible brightness. In the World quarters, Kayla's little boy Austin was chasing a ball along the corridor, his energy suit a faint glimmer in the low light. He stopped to watch Noah shed his own suit.

Austin said, "I wanna do that."

"You will, some day. Maybe soon. Where's your mother?"

"She comes right back. I stay right here!"

"Good boy. Have you—hi, Kayla. Do you know where Mee^haoi is?"

"No. Oh, wait, yes—he left the sanctuary."

That, Noah remembered, was what both Kayla and her sister called the World section of the *Embassy*. "Sanctuary"—the term made him wonder what their life had been before they came aboard. Both, although pleasant enough, were close-mouthed about their pasts to the point of lock-jaw.

Kayla added, "I think Mee^haoi said it was about the attack."

It would be, of course. Noah knew he should wait until Mee^haoi was free. But he couldn't wait.

"Where's Llaa^mohi?"

Kayla looked blank; her Worldese was not yet fluent.

"Officer Jones."

"Oh. I just saw her in the garden."

Noah strode to the garden. Llaa^mohi sat on a bench, watching water fall in a thin stream from the

ceiling to a pool below. Delicately she fingered a llo flower, without picking it, coaxing the broad dark leaf to release its spicy scent. Noah and Llaa^mohi had avoided each other ever since Noah's welcome ceremony, and he knew why. Still, right now his need overrode awkward desire.

"Llaa^mohi—may we speak together?" He hoped he had the verb tense right: urgency coupled with supplication.

"Yes, of course." She made room for him on the bench. "Your Worldese progresses well."

"Thank you. I am troubled in my liver." The correct idiom, he was certain. Almost.

"What troubles your liver, brother mine?"

"My mother." The word meant not only female parent but matriarchal clan leader, which Noah supposed that Marianne was, since both his grandmothers were dead. Although perhaps not his biological grandmothers, and to World, biology was all. There were no out-of-family adoptions.

"Yes?"

"She is Dr. Marianne Jenner, as you know, working aboard the *Embassy*. My brother and sister live ashore. What will happen to my family when the spore cloud comes? Does my mother go with us to World? Do my birth-siblings?" But . . . how could they, unaltered? Also, they were not of his haplotype and so would belong to a different clan for lllathil, clans not represented aboard ship. Also, all three of them would hate everything about

World. But otherwise they would die. All of them, dead.

Llaa^mohi said nothing. Noah gave her the space and time to think; one thing World humans hated about Terrans was that they replied so quickly, without careful thought, sometimes even interrupting each other and thereby dishonoring the speaker. Noah watched a small insect with multicolored wings, whose name did not come to his fevered mind, cross the llo leaf, and forced his body to stay still.

Finally Llaa^mohi said, "Mee^haoi and I have discussed this. He has left this decision to me. You are one of us now. I will tell you what will happen when the spore cloud comes."

"I thank you for your trust." The ritual response, but Noah meant it.

"However, you are under obligation—" she used the most serious degree for a word of promise "—to say nothing to anyone else, World or Terran. Do you accept this obligation?"

Noah hesitated, and not from courtesy. Shouldn't he use the information, whatever it was, to try to ensure what safety was possible for his family? But if he did not promise, Llaa^mohi would tell him nothing.

"I accept the obligation."

She told him.

Noah's jaw dropped. He couldn't help it, even though it was very rude. Llaa^mohi was carefully

not looking at him; perhaps she had anticipated this reaction.

Noah stood and walked out of the garden.

MARIANNE

"Thought," a famous poet—Marianne couldn't remember which one—had once said, "is an infection. In the case of certain thoughts, it becomes an epidemic." Lying in her bed in the quarantine chamber, Marianne felt an epidemic in her brain. What Elizabeth had done, what she herself harbored now in her body, Noah's transformation, Evan's death—the thoughts fed on her cells, fevered her mind.

Elizabeth, studying the complex layout of the Embassy: *"Where do the Denebs live?" "Behind these doors here."*

Noah, with his huge alien eyes.

Evan, urging her to meet the aliens by scribbling block letters on a paper sushi bag: CHANCE OF SIX THOUSAND LIFETIMES! The number of generations since Mitochondrial Eve.

Herself, carrying the deadly infection. Elizabeth, Noah, Evan, spores—it was almost a relief when Ambassador Smith appeared beyond the glass.

"Dr. Jenner," the ceiling said in uninflected translation. "I am so sorry you were injured in this attack. You said you want to see me now."

She hadn't been sure what she was going to say to him. How did you name your own child a possible terrorist, condemn her to whatever unknown form justice took among aliens? What if that meant something like drawing and quartering, as it once had on Earth? Marianne opened her mouth, and what came out were words she had not planned at all.

"Why did you permit Drs. Namechek and Lloyd to infect themselves three times when it violates both our medical code and yours?"

His face, both Terran and alien, that visage that now and forever would remind her of what Noah had done to his own face, did not change expression. "You know why, Dr. Jenner. It was necessary for the research. There is no other way to fully assess immune system response in ways useful to developing antidotes."

"You could have used your own people!"

"There are not enough of us to put anyone into quarantine."

"You could have run the experiment yourself with human volunteers. You'd have gotten volunteers, given what Earth is facing. And then the experiment could have had the advantage of your greater expertise."

"It is not much greater than yours, as you know. Our scientific knowledges have moved in different directions. But if we had sponsored experiments on Terrans, what would have been the Terran response?"

Marianne was silent. She knew the answer. They both knew the answer.

He said, "You are infected, I am told. We did not cause this. But now our two peoples can work more openly on developing medicines or vaccines. Both Earth and World will owe you an enormous debt."

Which she would never collect. In roughly two more days she would be dead of spore disease.

And she still had to tell him about Elizabeth.

"Ambassador Smith—"

"I must show you something, Dr. Jenner. If you had not sent for me, I would have come to you as soon as I was informed that you were awake. Your physician performed an autopsy on the terrorist. That is, by the way, a useful word, which does not exist on World. We shall appropriate it. The doctors found this in the mass of body tissues. It is engraved titanium, possibly created to survive the blast. Secretary-General Desai suggests that it is a means to claim credit, a 'logo.' Other Terrans have agreed, but none know what it means. Can you aid us? Is it possibly related to one of the victims? You were a close friend of Dr. Blanford."

He held up something close to the glass: a flat piece of metal about three inches square. Whatever was pictured on it was too small for Marianne to see from her bed.

Smith said, "I will have Dr. Potter bring it to you."

"No, don't." Ann would have to put on a space suit and maneuver through the double airlock with

respirator. The fever in Marianne's brain could not wait that long. She pulled out her catheter tube, giving a small shriek at the unexpected pain. Then she heaved herself out of bed and dragged the IV pole over to the clear barrier. Ann began to sputter. Marianne ignored her.

On the square of metal was etched a stylized purple rocket ship, sprouting leaves.

Not Elizabeth. Ryan.

"Dr. Jenner?"

"They're an invasive species," Ryan had said.

"Didn't you hear a word I said?" Marianne said. "They're not 'invasive,' or at least not if our testing confirms the ambassador's story. They're native to Earth."

"An invasive species is native to Earth. It's just not in the ecological niche it evolved for."

"Dr. Jenner?" the ambassador repeated. "Are you all right?"

Ryan, his passion about purple loosestrife a family joke. Ryan, interested in the *Embassy*, as Connie was not, asking questions about the facilities and the layout while Marianne cuddled her new grandson. Ryan, important enough in this terrorist organization to have selected its emblem from a sheet of drawings in a kitschy bathroom.

Ryan, her son.

"Dr. Jenner, I must insist—"

"Yes. *Yes*. I recognize that thing. I know who—what group—you should look for." Her heart shattered.

Smith studied her through the glass. The large,

calm eyes—Noah's eyes now, except for the color—held compassion.

"Someone you know."

"Yes."

"It doesn't matter. We shall not look for them."

The words didn't process. "Not . . . not look for them?"

"No. It will not happen again. The embassy has been sealed and the Terrans removed except for a handful of scientists directly involved in immunology, all of whom have chosen to stay, and all of whom we trust."

"But—"

"And, of course, those of our clan members who wish to stay."

Marianne stared at Smith through the glass, the impermeable barrier. Never had he seemed more alien. Why would this intelligent man believe that just because a handful of Terrans shared a mitochondrial haplotype with him, they could not be terrorists, too? Was it a cultural blind spot, similar to the Terran millennia-long belief in the divine right of kings? Was it some form of perception, the product of divergent evolution, that let his brain perceive things she could not? Or did he simply have in place such heavy surveillance and protective devices that people like Noah, sequestered in a different part of the *Embassy*, presented no threat?

Then the rest of what he had said struck her. "Immunologists?"

"Time is short, Dr. Jenner. The spore cloud will envelop Earth in merely a few months. We must perform intensive tests on you and the other infected people."

"Other?"

"Dr. Ahmed Rafat and two lab technicians, Penelope Hodgson and Robert Chavez. They are, of course, all volunteers. They will be joining you soon in quarantine."

Rage tore through her, all the rage held back, pent up, about Evan's death, about Ryan's deceit, about Noah's defection. "Why not any of your own people? No, don't tell me that you're all too valuable—so are we! Why only Terrans? If we take this risk, why don't you? And what the fuck happens when the cloud does hit? Do you take off two days before, keeping yourselves safe and leaving Earth to die? You know very well that there is no chance of developing a real vaccine in the time left, let alone manufacturing and distributing it! What then? How can you just—"

But Ambassador Smith was already moving away from her, behind the shatterproof glass. The ceiling said, without inflection or emotion, "I am sorry."

NOAH

Noah stood in the middle of the circle of Terrans. Fifty, sixty—they had all come aboard the *Embassy* in

the last few days, as time shortened. Not all were L7s; some were families of clan brothers, and these too had been welcomed, since they'd had the defiance to ask for asylum when the directives said explicitly that only L7s would be taken in. *There was something wrong with this system,* Noah thought, but he did not think hard about what it might be.

The room, large and bare, was in neither the World quarters nor the now-sealed part of the *Embassy* where the Terran scientists worked. The few scientists left aboard, anyway. The room's air, gravity, and light were all Terran, and Noah again wore an energy suit. He could see its faint shimmer along his arms as he raised them in welcome. He hadn't realized how much he was going to hate having to don the suit again.

"I am Noah," he said.

The people pressed against the walls of the bare room or huddled in small groups or sat as close to Noah as they could, cross-legged on the hard floor. They looked terrified or hopeful or defiant or already grieving for what might be lost. They all, even the ones who, like Kayla and Isabelle, had been here for a while, expected to die if they were left behind on Earth.

"I will be your leader and teacher. But first, I will explain the choice you must all make, now. You can choose to leave with the people of World, when we return to the home world. Or you can stay here, on Earth."

"To die!" someone shouted. "Some choice!"

Noah found the shouter: a young man standing close behind him, fists clenched at his side. He wore ripped jeans, a pin through his eyebrow, and a scowl. Noah felt the shock of recognition that had thrilled through him before with the nurse on the Upper West Side of New York and when he'd met Mee^haoi. Not even Llaa^mohi, who was a geneticist, could explain that shock, although she seemed to think it had to do with certain genetically determined pathways in Noah's L7 brain coupled with the faint electromagnetic field surrounding every human skull. She was fascinated by it.

Lisa Guiterrez, Noah remembered, had also attributed it to neurological pathways, changed by his heavy use of sugarcane.

Noah said to the scowler, "What is your name?"

He said, "Why?"

"I'd like to know it. We are clan brothers."

"I'm not your fucking brother. I'm here because it's my only option to not die."

A child on its mother's lap started to cry. People murmured to each other, most not taking their eyes off Noah. Waiting, to see what Noah did about the young man. Answer him? Let it go? Have him put off the *Embassy*?

Noah knew it would not take much to ignite these desperate people into attacking him, the alien-looking stand-in for the Worlders they had no way to reach.

He said gently to the young man, to all of them, to his absent and injured and courageous mother: "I'm going to explain your real choices. Please listen."

MARIANNE

Something was wrong.

One day passed, then another, then another. Marianne did not get sick. Nor did Ahmed Rafat and Penny Hodgson. Robbie Chavez did, but not very.

The lead immunologist left aboard the *Embassy*, Harrison Rice, stood with Ann Potter in front of Marianne's glass quarantine cage, known as a "slammer." He was updating Marianne on the latest lab reports. In identical slammers, two across a narrow corridor and one beside her, Marianne could see the three other infected people. The rooms had been created, as if by alchemy, by a Deneb that Marianne had not seen before—presumably an engineer of some unknowable building methods. Ahmed stood close to his glass, listening. Penny was asleep. Robbie, his face filmed with sweat, lay in bed, listening.

Ann Potter said, "You're not initially viremic but—"

"What does that mean?" Marianne interrupted.

Dr. Rice answered. He was a big, bluff Canadian who looked more like a truck driver who hunted moose than like a Nobel Prize winner. In his sixties,

still strong as a mountain, he had worked with Ebola, Marburg, Lassa fever, and Nipah, both in the field and in the lab.

He said, "It means lab tests show that as with Namechek and Lloyd, the spores were detectable in the first samples taken from your respiratory tract. So the virus should be present in your bloodstream and so have access to the rest of your body. However, we can't find it. Well, that can happen. Viruses are elusive. But as far as we can tell, you aren't developing antibodies against the virus, as the infected mice did. That may mean that we just haven't isolated the antibodies yet. *Or* that your body doesn't consider the virus a foreign invader, which seems unlikely. *Or* that in humans but not in mice, the virus has dived into an organ to multiply until its offspring burst out again. Malaria does that. *Or* that the virus samples in the lab, grown artificially, have mutated into harmlessness, differing from their wild cousins in the approaching cloud. *Or* it's possible that none of us know what the hell we're doing with this crazy pathogen."

Marianne said, "What do the Denebs think?" Supposedly Rice was co-lead with Deneb Scientist Jones.

He said, his anger palpable even through the glass wall of the slammer, "I have no idea what they think. None of us have seen any of them."

"Not seen them?"

"No. We share all our data and samples, of course. Half of the samples go into an airlock for them, and

the data over the LAN. But all we get in return is a thank-you on screen. Maybe they're not making progress, either, but at least they could tell us what they haven't discovered."

"Do we know . . . this may sound weird, but do we know that they're still here at all? Is it possible they all left Earth already?" *Noah*.

He said, "It's possible, I suppose. We have no news from the outside world, of course, so it's possible they prerecorded all those thank-yous, blew up New York, and took off for the stars. But I don't think so. If they had, they'd have at least unsealed us from this floating plastic bubble. Which, incidentally, has become completely opaque, even on the observation deck."

Marianne hadn't known there was an observation deck. She and Evan had not found it during their one exploration of the *Embassy*.

Dr. Rice continued. "Your cells are not making an interferon response, either. That's a small protein molecule that can be produced in any cell in response to the presence of viral nucleic acid. You're not making it."

"Which means . . ."

"Probably it means that there is no viral nucleic acid in your cells."

"Are Robbie's cells making interferon?"

"Yes. Also antibodies. Plus immune responses like—Ann, what does your chart on Chavez show for this morning?"

Ann said, "Fever of 101, not at all dangerous. Chest congestion, also not at dangerous levels, some sinus involvement. He has the equivalent of mild bronchitis."

Marianne said, "But why is Robbie sick when the rest of us aren't?"

"Ah," Harrison Rice said, and for the first time she heard the trace of a Canadian accent, "that's the big question, isn't it? In immunology, it always is. Sometimes genetic differences between infected hosts are the critical piece of the puzzle in understanding why an identical virus causes serious disease or death in one individual—or one group—and little reaction or none at all in other people. Is Robbie sick and you not because of your respective genes? We don't know."

"But you can use Robbie's antibodies to maybe develop a vaccine?"

He didn't answer. She knew the second the words left her mouth how stupid they were. Rice might have antibodies, but he had no time. None of them had enough time.

Yet they all worked on, as if they did. Because that's what humans did.

Instead of answering her question, he said, "I need more samples, Marianne."

"Yes."

Fifteen minutes later he entered her slammer, dressed in full space suit and sounding as if speaking through a vacuum cleaner. "Blood samples plus

a tissue biopsy, just lie back down and hold still, please. . . ."

During a previous visit, he had told her of an old joke among immunologists working with lethal diseases: "The first person to isolate a virus in the lab by getting infected is a hero. The second is a fool." Well, that made Marianne a fool. So be it.

She said to Rice, "And the aliens haven't—Ow!"

"Baby." He withdrew the biopsy needle and slapped a bandage over the site.

She tried again. "And the aliens haven't commented at all on Robbie's diagnosis? Not a word?"

"Not a word."

Marianne frowned. "Something isn't right here."

"No," Rice said, bagging his samples, "it certainly is not."

NOAH

Nothing, Noah thought, *had ever felt more right, not in his entire life.*

He raised himself on one elbow and looked down at Llaa^mohi. She still slept, her naked body and long legs tangled in the light blanket made of some substance he could not name. Her wiry dark hair smelled of something like cinnamon, although it probably wasn't. The blanket smelled of sex.

He knew now why he had not felt the same

shock of recognition at their first meeting that he had felt with Mee^haoi and the unnamed New York nurse and surly young Tony Schrupp. After the World geneticists had done their work, Mee^haoi had explained it to him. Noah felt profound relief. He and Llaa^mohi shared a mitochondrial DNA group, but not a nuclear DNA one. They were not too genetically close to mate.

Of course, they could have had sex anyway; World had earlier, and without cultural shame or religious prejudice, discovered birth control. But for the first time in his life, Noah did not want just sex. He wanted to mate.

The miracle was that she did, too. Initially he feared that for her it was mere novelty: be the first Worlder to sleep with a Terran! But it was not. Just yesterday they had signed a five-year mating contract, followed by a lovely ceremony in the garden to which every single Worlder had come. Noah had never known exactly how many were aboard the *Embassy*; now he did. They had all danced with him, every single one, and also with her. Mee^haoi himself had pierced their right ears and hung from them the wedding silver, shaped like stylized versions of the small flowers that had once, very long ago, been the real thing.

"Is better," Noah had said in his accented, still clumsy World. "We want not bunch of dead vegetation dangle from our ears." At least, that's what he hoped he'd said. Everyone had laughed.

Noah reached out one finger to stroke Llaa^mohi's hair. A miracle, yes. A whole skyful of miracles, but none as much as this: Now he knew who he was and where he belonged and what he was going to do with his life.

His only regret was that his mother had not been at the mating ceremony. And—yes, forgiveness was in order here!—Elizabeth and Ryan, too. They had disparaged him his entire life and he would never see them again, but they were still his first family. Just not the one that any longer mattered.

Llaa^mohi stirred, woke, and reached for him.

MARIANNE

Robbie Chavez, recovered from *Respirovirus sporii*, gave so many blood and tissue samples that he joked he'd lost ten pounds without dieting. It wasn't much of a joke, but everyone laughed. Some of the laughter held hysteria.

Twenty-two people remained aboard the *Embassy*. Why, Marianne sometimes wondered, had these twenty-two chosen to stay and work until the last possible second? Because the odds of finding anything that would affect the coming die-off were very low. They all knew that. Yet here they were, knowing they would die in this fantastically equipped, cut-off-from-the-world lab instead of with their families.

Didn't any of them have families? Why were they still here?

Why was she?

No one discussed this. They discussed only work, which went on eighteen hours a day. Brief breaks for microwaved meals from the freezer. Briefer—not in actuality, but that's how it felt—for sleep.

The four people exposed to *R. sporii* worked outside the slammers; maintaining biosafety no longer seemed important. No one else became ill. Marianne relearned lab procedures she had not performed since grad school. Theoretical evolutionary biologists did not work as immunologists. She did now.

Every day, the team sent samples data to the Denebs. Every day, the Denebs gave thanks, and nothing else.

In July, eight-and-a-half months after they'd first been given the spores to work with, the scientists finally succeeded in growing the virus in a culture. There was a celebration of sorts. Harrison Rice produced a hoarded bottle of champagne.

"We'll be too drunk to work," Marianne joked. She'd come to admire Harrison's unflagging cheerfulness.

"On one twenty-second of one bottle?" he said. "I don't think so."

"Well, maybe not everyone drinks."

Almost no one did. Marianne, Harrison, and Robbie Chavez drank the bottle. Culturing the virus, which should have been a victory, seemed to turn the irritable more irritable, the dour more dour.

The tiny triumph underlined how little they had actually achieved. People began to turn strange. The unrelenting work, broken sleep, and constant tension created neuroses.

Penny Hodgson turned compulsive about the autoclave: It must be loaded just so, in just this order, and only odd numbers of tubes could be placed in the rack at one time. She flew into a rage when she discovered eight tubes, or twelve.

William Parker, Nobel Laureate in medicine, began to hum as he worked. Eighteen hours a day of humming. If told to stop, he did, and then unknowingly resumed a few minutes later. He could not carry a tune, and he liked lugubrious country and western tunes.

Marianne began to notice feet. Every few seconds, she glanced at the feet of others in the lab, checking that they still had them. Harrison's work boots, as if he tramped the forests of Hudson's Bay. Mark Wu's black oxfords. Penny's Nikes—did she think she'd be going for a run? Robbie's sandals. Ann's—

Stop it, Marianne!

She couldn't.

They stopped sending samples and data to the Denebs and held their collective breath, waiting to see what would happen. Nothing did.

Workboots, Oxfords, Nikes, sandals—

"I think," Harrison said, "that I've found something."

It was an unfamiliar protein in Marianne's blood. Did it have anything to do with the virus? They

didn't know. Feverishly they set to work culturing it, sequencing it, photographing it, looking for it in everyone else. The protein was all they had.

It was August.

The outside world, with which they had no contact, had ceased to exist for them, even as they raced to save it.

Workboots—

Oxfords—

Sandals—

NOAH

Rain fell in the garden. Noah tilted his head to the artificial sky. He loved rainy afternoons, even if this was not really rain, nor afternoon. Soon he would experience the real thing.

Llaa^mohi came toward him through the dark, lush leaves open as welcoming hands. Noah was surprised; these important days she rarely left the lab. Too much to do.

She said, "Should not you be teaching?"

He wanted to say *I'm playing hooky* but had no idea what the idiom would be in Worldese. Instead he said, hoping he had the tenses right, "My students I will return at soon. Why you here? Something is wrong?"

"All is right." She moved into his arms. Again Noah

was surprised; Worlders did not touch sexually in public places, even public places temporarily empty. Others might come by, unmated others, and it was just as rude to display physical affection in front of those without it as to eat in front of anyone hungry.

"Llaa^mohi—"

She whispered into his ear. Her words blended with the rain, with the rich flower scents, with the odor of wet dirt. Noah clutched her and began to cry.

VI: S minus two weeks

MARIANNE

The Commons outside the lab was littered with frozen food trays, with discarded sterile wrappings, with an empty disinfectant bottle. Harrison slumped in a chair and said the obvious.

"We've failed, Marianne."

"Yes," she said. "I know." And then, fiercely, "Do you think the Denebs know more than we do? And aren't sharing?"

"Who knows?"

"Fucking bastards," Marianne said. Weeks ago she had crossed the line from defending the aliens to blaming them. How much of humanity had been ahead of her in that? By now, maybe all of it.

They had discovered nothing useful about the anomalous protein in Marianne's blood. The human body contained so many proteins whose identities

were not understood. But that wouldn't make any difference, not now. There wasn't enough time.

"Harrison," she began, and didn't get to finish her sentence.

Between one breath and the next, Harrison Rice and the lab, along with everything else, disappeared.

NOAH

Nine, not counting him. The rest had been put ashore, to face whatever would happen to them on Earth. Noah would have much preferred to be with Llaa^mohi, but she of course had duties. Even unannounced, departure was dangerous. Too many countries had too many formidable weapons.

So instead of standing beside Llaa^mohi, Noah sat in his energy suit in the Terran compartment of the shuttle. Around him, strapped into chairs, sat the nine Terrans going to World. The straps were unnecessary; Llaa^mohi had told him that the acceleration would feel mild, due to the same gravity-altering machinery that had made the World section of the *Embassy* so comfortable. But Terrans were used to straps in moving vehicles, so there were straps.

Kayla Rhinehart and her little son.

Her sister, Isabelle.

The surly Tony Schrupp, a surprise. Noah had been sure Tony would change his mind.

A young woman, five months pregnant, who "wanted to give my baby a better life." She did not say what her previous life had been, but there were bruises on her arms and legs.

A pair of thirty-something brothers with restless, eager-for-adventure eyes.

A middle-aged journalist with a sun-leathered face and impressive byline, recorders in her extensive luggage.

And, most unexpected, a Terran physicist, Dr. Nathan Beyon of Massachusetts Institute of Technology.

Nine Terrans willing to go to the stars.

A slight jolt. Noah smiled at the people under his leadership—he, who had never led anything before, not even his own life—and said, "Here we go."

That seemed inadequate, so he said, "We are off to the stars!"

That seemed dumb. Tony sneered. The journalist looked amused. Austin clutched his mother.

Noah said, "Your new life will be wonderful. Believe it."

Kayla gave him a wobbly smile.

MARIANNE

She could not imagine where she was.

Cool darkness, with the sky above her brightening every second. It had been so long since she'd seen

a dawn sky, or any sky. Silver-gray, then pearl, and now the first flush of pink. The floor rocked gently. Then the last of the knock-out gas left her brain and she sat up. A kind of glorified barge, flat and wide with a single square rod jutting from the middle. The barge floated gently on New York Harbor. The sea was smooth as polished gray wood. In one direction rose the skyline of Manhattan; in the other, the *Embassy*. All around her lay her colleagues: Dr. Rafat, Harrison Rice and Ann Potter, lab techs Penny and Robbie, all the rest of the twenty-two people who'd still been aboard the *Embassy*. They wore their daily clothing. In her jeans and tee, Marianne shivered in a sudden breeze.

Nearby lay a pile of blankets. She took a yellow one and wrapped it around her shoulders. It felt warm and silky, although clearly not made of silk. Other people began to stir. Pink tinged the east.

Harrison came to her side. "Marianne?"

Automatically she said, because she'd been saying so many times each day, "I feel fine." And then, "What the *fuck*?"

He said something just as pointless: "But we have two more weeks!"

"Oh my God!" someone cried, pointing, and Marianne looked up. The eastern horizon turned gold. Against it, a ship, dark and small, shot from the *Embassy* and climbed the sky. Higher and higher, while everyone on the barge shaded their eyes against the rising sun and watched it fly out of sight.

"They're going," someone said quietly.

They. The Denebs. *Noah*.

Before the tears that stung her eyes could fall, the *Embassy* vanished. One moment it was there, huge and solid and gray in the predawn, and the next it was just gone. The water didn't even ripple.

The metal rod in the center of the ship spoke. Marianne, along with everyone else, turned sharply. Shoulder-high, three feet on a side, the rod had become four screens, each filled with the same alien/human image and mechanical voice.

"This is Ambassador Smith. A short time from now, this recording will go to everyone on Earth, but we wanted you, who have helped us so much, to hear it first. We of World are deeply in your debt. I would like to explain why, and to leave you a gift.

"Your astronomers' calculations were very slightly mistaken, and we did not correct them. In a few hours the spore cloud will envelop your planet. We do not think it will harm you because—"

Someone in the crowd around the screen cried, *"What?"*

"—because you are genetically immune to this virus. We suspected as much before we arrived, although we could not be sure. *Homo sapiens* acquired immunity when Earth passed through the cloud the first time, about seventy-thousand years ago."

A graphic replaced Smith's face: the Milky Way galaxy, a long dark splotch overlapping it, and a glowing blue dot for Earth. "The rotation of the

galaxy plus its movement through space-time will bring you back into contact with the cloud's opposite edge from where it touched you before. Your physicists were able to see the approaching cloud, but your instruments were not advanced enough to understand its shape or depth. Earth will be passing through the edge of the cloud for two-point-six years. On its first contact, the cloud killed every *Homo sapiens* that did not come with this genetic mutation."

A gene sequence of base pairs flashed across the screen, too fast to be noted.

"This sequence will appear again later, in a form you can record. It is found in what you call 'junk DNA.' The sequence is a transposon and you will find it complementary to the spores' genetic code. Your bodies made no antibodies against the spores because it does not consider them invaders. Seventy thousand years ago our people had already been taken from Earth or we, too, would have died. We are without this sequence, which appeared in mutation later than our removal."

Marianne's mind raced. Seventy thousand years ago. The "bottleneck event" that had shrunk the human population on Earth to a mere few thousand. It had not been caused by the Toba volcano or ferocious predators or climate changes, but by the spore cloud. As for the gene sequence—one theory said that much of the human genome consisted of inactive and fossilized viruses absorbed into the

DNA. Fossilized and inactive—almost she could hear Evan's voice: *"Or so we thought. . . ."*

Smith continued. "You will find that in Marianne Jenner, Ahmed Rafat, and Penelope Hodgson this sequence has already activated, producing the protein already identified in Dr. Jenner's blood, a protein that this recording will detail for you. The protein attaches to the outside of cells and prevents the virus from entering. Soon the genetic sequence will do so in the rest of humanity. Some may become mildly ill, like Robert Chavez, due to faulty protein production. We estimate this will comprise perhaps twenty percent of you. There may be fatalities among the old or already sick, but most of you are genetically protected. Your rodents do not seem to be, which we admit was a great surprise to us, and we cannot say for certain what other Terran species may be susceptible.

"We know that we are fatally susceptible. We cannot alter our own genome, at least not for the living, but we have learned much from you. By the time the spore cloud reaches World, we will have developed a vaccine. This would not have been possible without your full cooperation and your bodily samples. We—"

"If this is true," Penny Hodgson shouted, "why didn't they *tell* us?"

"—did not tell you the complete truth because we believe that had you known Earth was in no critical danger, you would not have allocated so many resources, so much scientific talent, or such urgency

into the work on the *Embassy*. We are all human, but your evolutionary history and present culture are very different from ours. You do not build identity on family. You permit much of Earth's population to suffer from lack of food, water, and medical care. We didn't think you would help us as much as we needed unless we withheld from you certain truths. If we were mistaken in our assessment, please forgive us."

They weren't mistaken, Marianne thought.

"We are grateful for your help," Smith said, "even if obtained fraudulently. We leave you a gift in return. This recording contains what you call the 'engineering specs' for a star drive. We have already given you the equations describing the principles. Now you may build a ship. In generations to come, both branches of humanity will profit from more open and truthful exchanges. We will become true brothers.

"Until then, ten Terrans accompany us home. They have chosen to do this, for their own reasons. All were told that they would not die if they remained on Earth, but chose to come anyway. They will become World, creating further friendship with our clan brothers on Terra.

"Again—thank you."

Pandemonium erupted on the barge: talking, arguing, shouting. The sun was above the horizon now. Three Coast Guard ships barreled across the harbor toward the barge. As Marianne clutched her

yellow blanket closer against the morning breeze, something vibrated in the pocket of her jeans.

She pulled it out: a flat metal square with Noah's face on it. As soon as her gaze fell on his, the face began to speak. "I'm going with them, Mom. I want you to know that I am completely happy. This is where I belong. I've mated with Llaa^mohi—Dr. Jones—and she is pregnant. Your grandchild will be born among the stars. I love you."

Noah's face faded from the small square.

Rage filled her, red sparks burning. Her son, and she would never see him again! Her grandchild, and she would never see him or her at all. She was being robbed, being deprived of what was hers by *right*, the aliens should never have come—

She stopped. Realization slammed into her, and she gripped the rail of the barge so tightly that her nails pierced the wood.

The aliens *had* made a mistake. A huge, colossal, monumental mistake.

Her rage, however irrational, was going to be echoed and amplified across the entire planet. The Denebs had understood that Terrans would work really hard only if their own survival were at stake. But they did not understand the rest of it. The Deneb presence on Earth had caused riots, diversion of resources, deaths, panic, fear. The "mild illness" of the twenty percent like Robbie, happening all at once starting today, was enough to upset every economy on the planet. The aliens had swept like

a storm through the world, and as in the aftermath of a superstorm, everything in the landscape had shifted. In addition, the Denebs had carried off ten humans, which could be seen as brainwashing them in order to procure prospective lab rats for future experimentation.

Brothers, yes—but Castor and Pollux, whose bond reached across the stars, or Cain and Abel?

Humans did not forgive easily, and they resented being bought off, even with a star drive. Smith should have left a different gift, one that would not let Terrans come to World, that peaceful and rich planet so unaccustomed to revenge or war.

But on the other hand—she could be wrong. Look how often she had been wrong already: about Elizabeth, about Ryan, about Smith. Maybe, when the Terran disruptions were over and starships actually built, humanity would become so entranced with the Deneb gift that we would indeed go to World in friendship. Maybe the prospect of going to the stars would even soften American isolationism and draw countries together to share the necessary resources. It could happen. The cooperative genes that had shaped Smith and Jones were also found in the Terran genome.

But—it would happen only if those who wanted it worked hard to convince the rest. Worked, in fact, as hard at urging friendship as they had at ensuring survival. Was that possible? Could it be done?

Why are you here?

To make contact with World. A peace mission.

She gazed up at the multicolored dawn sky, but the ship was already out of sight. Only its after-image remained in her sight.

"Harrison," Marianne said, and felt her own words steady her, "we have a lot of work to do."

About the Author

Nancy Kress is the author of thirty-two books, including twenty-five novels, four collections of short stories, and three books about writing. Her work has won two Hugos ("Beggars in Spain" and "The Erdmann Nexus"), five Nebulas (all for short fiction), a Sturgeon ("The Flowers of Aulit Prison"), and a John W. Campbell Memorial Award (for *Probability Space*). The novels include science fiction, fantasy, and thrillers; many concern genetic engineering. Her most recent work is the Nebula-winning and Hugo-nominated *After the Fall, Before the Fall, During the Fall* (Tachyon, 2012), a long novella of eco-disaster, time travel, and human resiliency.

Intermittently, Nancy teaches writing workshops at various venues around the country, including Clarion West and Taos Toolbox (yearly, with Walter

Jon Williams). A few years ago she taught at the University of Leipzig as the visiting Picador professor. She is currently working on a long, as-yet-untitled SF novel.

Nancy lives in Seattle with her husband, writer Jack Skillingstead, and Cosette, the world's most spoiled toy poodle.