

# ENDANGERED

A gold and copper strike bigger than the Klondike is setting up America's toughest environmental battle since the 1950s. **DANIEL DUANE** goes deep into the Alaskan wilderness to see what's at stake.



**"CHILI" WATERS** Guide Dan Oberlatz navigates the Chilikadrotna, a spectacular waterway upstream from the proposed Pebble mine.

# D ALASKA

photographs by COREY RICH



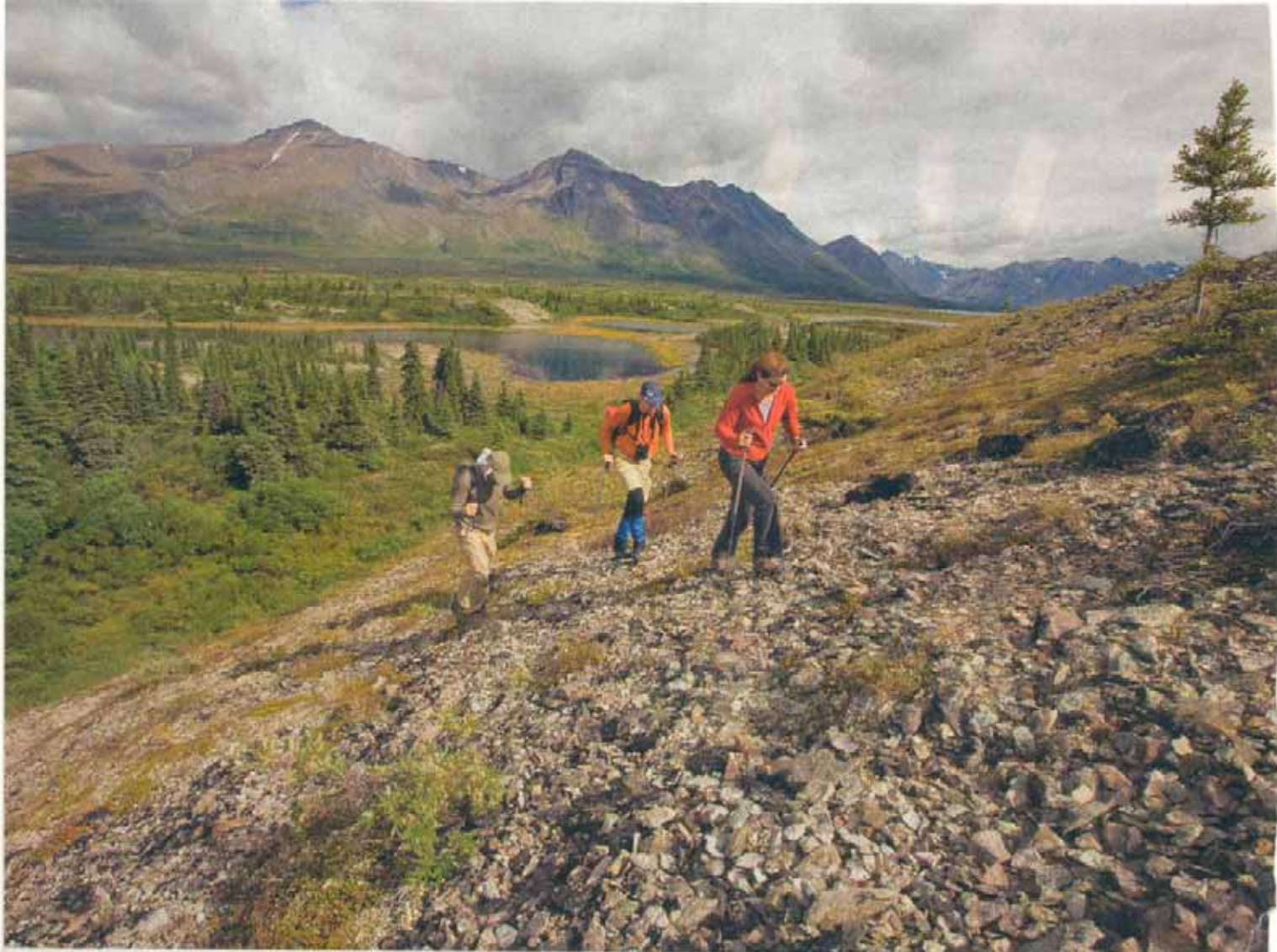
**T**HE CESSNA 206 BOUNCED AND FELL and rose again in the rough air, rattling the gear we'd packed tight behind our seats. "Whoa, Nellie," said someone behind me. Our bush pilot was running us and our boats out for a five-day expedition on the remote Chilikadrotna River — "the Chili," as they call it around here. We were 180 miles west of Anchorage on the Alaska Peninsula, flying as low as 150 feet over lakes bigger than Tahoe that the pilot described as "so clean you could drink every last drop."

Old-growth spruce forest climbed snowy mountainsides clear to the horizon, and unnamed rivers and creeks spidered across the green tundra, never passing a bridge or a home. It looked a lot like those westerns they film in the Canadian Rockies to create the illusion of a wilderness that goes on forever. Except out here, it's not an illusion.

"My goodness, will you just look at all those fish!" said Carol Ann Woody, our expedition biologist. The engine noise was deafening, so Woody had to bark into the mouthpiece of her headset: "What a great year this is going to be! I've never seen so many sockeye in my life!"

Woody, in her late 40s, with thick, blond-streaked brown hair, is one of the most prominent fisheries scientists in Alaska, so I knew that if she sounded breathless, it was for a reason. I pressed my nose to the cold window and saw zillions of red dots clotting the water — salmon by the tens of thousands, laying their eggs. In every creek after that, for miles and miles, were the same giant masses of spawning fish.

"That's a grizzly, isn't it, off to the left?" said Woody's husband, Joel Reynolds, chief biometrician for the U.S. Fish and Wildlife Service, which means he makes sure all biological



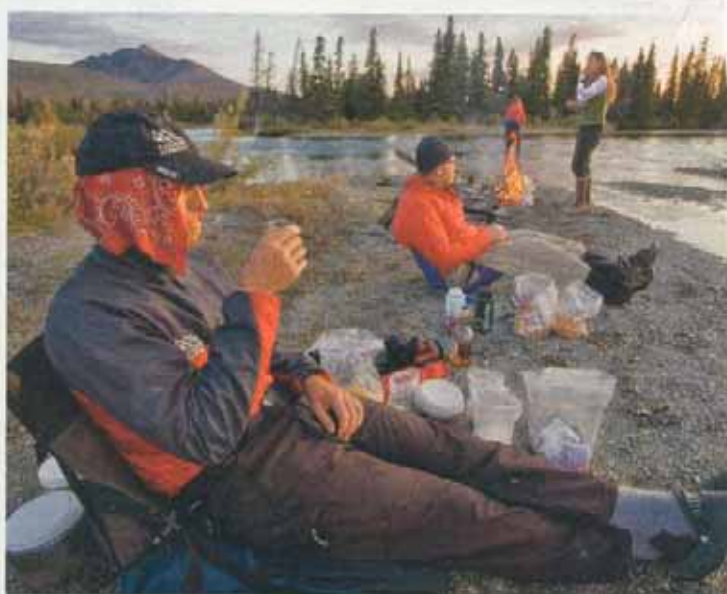
**AWESOME LANDSCAPE** Clockwise from above: A pre-trip hike above the ridgeline to get a look at the cinematic terrain surrounding the Chili headwaters; death quickly befalls sockeye salmon after they lay their eggs; scotch in a plastic bottle and not a road for 100 miles.

field research uses consistent data-gathering methods. A huge guy, 6-foot-6 and lanky, Reynolds was folded tight into his little seat, excitedly trying to point.

I didn't see the bear, but I saw the next one Reynolds spotted and the one after that: brown blots running full-speed through tall, waving grass. Even though I was about to spend a lot of time on the ground with them, I still loved the idea of thousand-pound carnivorous predators roaming as if they owned the Earth.

And it reminded me why Dan Oberlatz, a transplanted Californian who now runs a successful Alaskan backcountry guide service, brought me to this place; Engineers with the Northern Dynasty mining company claim to have located a half-trillion dollars worth of gold, copper, and molybdenum out here. That's an awful lot of precious metal, and potentially thousands of jobs in an economically depressed area. But extracting it will require digging the largest open pit mine in North America (a two-mile-wide hole visible from space). A pair of earthen dams (one, the world's largest at four miles long) will hold back 10 square miles of chemical waste. If this toxic lagoon ever leaks — ever — it will poison not only nearby streams and rivers but also the key spawning grounds for the largest sustainable salmon fishery on Earth, 200 miles downstream in Bristol Bay.

This venture, called Pebble Project, could be just the start. The Federal Bureau of Land Management has recommended opening nearly a million surrounding acres to mineral exploration, effectively creating a vast industrial district where there's currently wilderness. It's all shap-

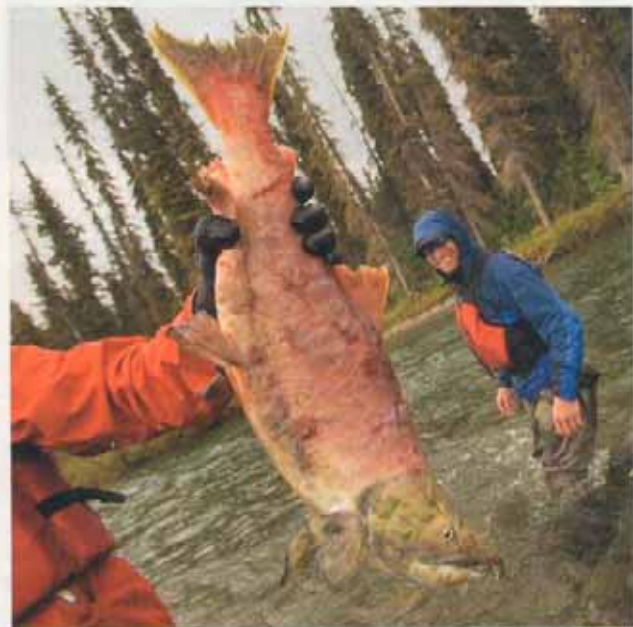


ing up to be the biggest conservation fight since the early 1950s, when a proposed dam inside Dinosaur National Monument wound up turning the Sierra Club into a big-time environmental advocacy group.

Woody, Reynolds, and Oberlatz, for their part, hoped to show me what every American stands to lose in this most natural of natural environments — a wilderness like the lower 48 hasn't seen in 150 years. And they hoped to do it in a way no helicopter ride ever could, with an unsupported run down a wild and remote river, right into the heart of this threatened landscape.

**P**ORT ALSWORTH, ALASKA, POPULATION 103, HUGS the southern shore of Lake Clark, a narrow, 50-mile-long body of water an hour west of Anchorage by plane. No roads connect the town to any other human settlement; everybody flies in and out, and two gravel airstrips double as the only streets. No stores, either: To buy groceries, locals have to pay one of two air taxis to take them to Anchorage.

I arrived two days before our river trip, joining Woody, Reynolds, and a Sierra Club activist named Lance Holter at Oberlatz's cabin. Woody, I learned that first night, had been a federal fisheries biologist in Alaska for 15 years, right up until she began speaking out about Pebble's threat to Bristol Bay salmon. Rather than be muzzled on the topic by her bosses, she chose to resign and commit full-time to fighting the dam.



They wanted to give me a look at the mine site before we left for the river expedition, so on my second day we chartered a floatplane. We landed first at a native Athabaskan village called Nondalton, where locals' subsistence lifestyles are based almost entirely on salmon runs. ("Pebble always promises jobs to pull us out of poverty," said one village leader, "and we say, 'What poverty? We have the salmon.'") Then we flew toward a series of rounded emerald-green hills. Helicopters began to appear, ferrying loads of equipment between core-sampling rigs — small drill sites surrounded by temporary fencing.

The Pebble Partnership, a consortium of foreign mining companies sharing the claim, has gone out of its way to build community support for the project, pouring tens of millions of dollars into preparing a thorough environmental impact statement. "Many of us are Alaskans and want to bring forward a win-win," partnership public affairs VP Mike Heatwole told me. "We're not going to compromise one industry for another." Partnership officials have asserted that the big dam will be "built to withstand seismic events larger than could actually happen in Alaska," and again and again they've insisted they won't begin mining unless they see a clear way to protect local fish and wildlife.

"But they've drilled more than 700 test holes already," Woody said, into her headset's microphone. "And as soon as you break up that ore and expose it to water and air, even in small amounts, you're leaking sulfites."

The Pebble mine proposal that could go before state, local, and federal regulators this year calls for two main sites — one an open pit and the other underground. Both will require enormous volumes of water to be diverted from nearby rivers in order to separate ore from the waste minerals, and big holes will penetrate so far below the water table they'll need vast pumping systems to be working at all times to keep the pits from becoming toxic lakes. More than 100 miles of new roads will have to be built to connect the mine site to a brand new

## WHEN WE PASSED THROUGH THE BEND, I HEARD MY CANOE-MATE SCREAM. DIRECTLY AHEAD WAS A 10-FOOT GRIZZLY.

deepwater port city out on Cook Inlet; slurry pipelines will have to go in parallel to that road to carry the ore to waiting ships; and all of this will require so much electrical power — more than the entire city of Anchorage uses — that a new power plant will have to be constructed, possibly across the Cook Inlet on Kodiak Island, with more than 200 miles of transmission lines to carry the current.

"Duane, you paying attention?" Woody asked into her headset. "We'll be coming down the Mulchatna River, which runs east-west, just over that next rise." That got my interest. The Mulchatna was the last leg of the canoe trip we'd begin the next day.

**T**HE STARTING POINT FOR OUR RIVER EXPEDITION was well to the east, on a big lake called Lower Twin Lake, at the junction of the Aleutian and Alaska mountain ranges, where they merge to form the Chignik. The Chilikadrotna River, our main waterway for the trip, drains out of that lake and runs 60 miles through watersheds upstream of the mine before joining the Mulchatna.

After arriving by floatplane, we sloshed back and forth to the beach, carrying three inflatable canoes, numerous dry bags, and two bright yellow steel barrels to protect our food from hungry grizzlies. Oberlatz wanted to wait until the next day to get started, so we pitched camp in low trees and set off to get the only overview we'd have, from a ridgeline high above.

Wild blueberries grew everywhere, along with low-bush cranberries, and we could see shredded areas where a grizzly had eaten entire bushes. He'd ripped a big trench in the dirt, too, hunting a ground squirrel dumb enough to think an underground tunnel would keep it safe from a hungry predator with rototiller claws.

Then, a quarter-mile off, we noticed a grizzly standing tall.

"Don't worry about him," said Oberlatz. "He's spent his whole life out here, and he's never seen anything like us. He's just trying to figure out what the hell we are. Let him get our scent."

Oberlatz, who once shot dead a grizzly that charged him, a friend, and that friend's 12-year-old daughter, carried a .44 Magnum revolver in a hip holster. He kept it loaded but with the hammer on an empty chamber.

The grizzly ran off, so we kept pushing upward. Thunder cracked. Rain started and then turned to hail as the temperature dropped and lightning flashes grew more frequent. The time delay to thunder was never more than a second, putting the strikes at well under a mile from our position.

National parks in continental U.S., as massive as they may be, always feel like parks: apex predators gone, roads marking the park boundary in every direction. In a way, that's great; you can actually take your kids camping and you don't even need a large-caliber firearm. Up here, it's different. We could've walked 600 miles to the Arctic Ocean or west to the Bering Sea, and all around was land full of grizzlies and black bears and vast herds of migrating caribou, thousands of wolf packs and elk and moose and more fish than anyone could eat in a lifetime. But to the southwest, only about 60 miles away, where the sun still shone, was the mine site.

"Wait, do you feel that?" Woody asked. "Is that lightning?"

I stared at her.

"Why are you looking at me like that? Oh, God, is my hair standing up?" Woody asked. She was well aware that electrical charge

builds in the air in the last few instants before a direct strike.

"That's got to be the wind in your hair, right?" said her worried husband, Reynolds.

"That is not wind," I replied.

"Okay, it's time to run," Oberlatz said. "Right now."

And we did, scattering like ants across the broken slope, running and running as thunder cracked and lightning struck directly where we had been standing only minutes before.

**W**E PADDED OFF THE BEACH the next morning and felt the acceleration as flat water slipped downhill. A pale-gray gyrfalcon shot from the sky with extended claws and nearly slaughtered a merganser duckling right before my eyes. Big sockeye salmon slithered in schools in the clear current; looking overboard I could see hundreds of them. They moved so slowly, I imagined I could reach in and pull out 10 pounds of dinner.

Oberlatz stopped us before sunset, and we hauled the canoes onto a sandy bank to camp. I tied a fly to my line and waded into the creek. The salmon, Woody pointed out, weren't biting. The way their life cycle works, they hatch in eggs under the winter's ice, in streams like this one, and then they swim out to sea with the spring melt. Spending years in the North Pacific, they suddenly reappear, as if by magic, at the mouth of the stream from which they first emerged, loitering in the brackish interface between saltwater and fresh. That's where commercial fishermen generally catch them, in a carefully orchestrated season that leaves enough adult salmon to swim back up their ancestral streams. These survivors cross lakes and find their way through second and third tributaries, taking first this fork and then that one, until they reach the very stretch of water in which they first popped out of an egg. This is why salmon are so unusual: Clean oceans aren't enough to keep them alive; salmon require a clean inland world, too.

Once they're ready to spawn, salmon lay eggs in the gravelly river bottom, cover the eggs with more clean gravel, and then simply die — millions of them, in creeks and streams all over this area. To see them in that state, as we did — adrift after spawning, life ebbing out of them — is to understand how profoundly salmon are a keystone species, critical to the health of an entire ecosystem. Not only do they feed all those grizzlies and eagles, and not only do their eggs support other fish in the streams, but by dying and therefore dumping hundreds of millions of pounds of nutrients onto these riverbanks every year, they give birth to the riparian habitat that also supports the moose and the caribou, and therefore the wolves who prey upon them.

"If you lose the salmon," Woody said, "you really lose the whole thing. The mine isn't just about one species."

Suddenly, Holter's fly rod bent in half. Silhouetted black against the pink evening sky, he held his ground in water to his hips. He dragged the fish back, into the shallows, then picked up a king salmon.

Woody was just trotting down to make sure he let the thing go — a great defender of fish, she tragically ensured that we ate not a single one — when we both heard one of the guys yell.

I couldn't make out what he said, but his tone sounded serious. I splashed to the shore in time to see a large grizzly bear not 15 feet from Holter.

The shouting startled the bear, and he jumped into the river. We watched his big head and furry ears float away.



**WILD LIFE** In Port Alsworth, as in much of rural Alaska, planes are more common than cars. Opposite: A grizzly enjoys a seafood buffet. If salmon migration is disrupted by the mine, bears could lose a key food source.

**W**E HAD TO COVER 35 MILES THE FOURTH DAY, so we woke early and pushed into the current. Grizzly tracks covered the mud along the river's edge; we saw grizzly shit, too, and wolf prints and wolf shit and moose prints and a moose's leg bone gnawed free of meat. We also saw big schools of sockeye swimming in the glassy water, as well as arctic grayling and rainbow trout, some two feet long; they follow the salmon, eating eggs that tumble free.

Sometime in the afternoon we came to a place where the rapids looked so thick with downed trees that we had to step out of the boats to scout. Hip-deep in the water, while the ice-cold current pressed against our chest waders, we held the canoes steady and tried to see.

"We had a big spring melt this year," Oberlatz said. "It took out this whole valley." This is exactly the kind of natural event that makes the proposed Pebble earthen dam so vulnerable. Oberlatz pointed out places where the forest had been flattened well away from the river, in wide flooding. Dead trees hung sideways across the main current, forming shoulder-high sweepers that could knock you out of your boat; other trees, half-submerged and bristling with branches, could trap a person underwater.

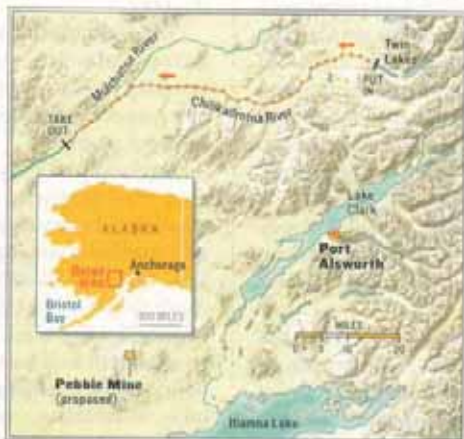
Woody and Reynolds took the lead into a deep, narrow channel between trees that leaned in close. Reynolds took a sideways spruce trunk across a shoulder, fell overboard, and sank. While he groped for the side of his canoe, Oberlatz caught a spruce in the chest and was launched backward, splashing into the current. I could see Holter, his canoe-mate, stop paddling to search underwater for a glimpse of Oberlatz, who was weighted down by chest waders, heavy boots, and the loaded .44.

Then Oberlatz's life jacket brought him to the surface. He gasped for air as photographer Corey Rich and I passed on his right, heading into a bend. That's when I heard Rich scream. Directly ahead, midcurrent, was a 10-foot grizzly.

Better paddlers would've worked in sync to zip the canoe across the river, out of harm's way, but all we accomplished was turning the boat broadside to the bear as the current swept us onward.

I began to yell, as loud as I could, "Bear! Bear! Bear! Fucking paddle, Corey! Paddle! Paddle!"

"Which way?"



Conservationists say the mine could impact salmon and wildlife for hundreds of miles, including on the expedition route.



"Left! Right! Shit! I don't know!"

But just like that the bear jumped onto the bank. He reared up to sniff the air, then sprinted up a hillside and vanished.

I could hear Oberlatz and Woody laughing in the boats behind us, and I lay back on the gear to look up at the gray sky. I was asking where Rich had packed our bourbon when he yelled, "Fuck! There's another one!"

The river was making a tight left bend, with the current forcing us hard into the right bank where a bear stood.

I started yelling again: "Hey bear! Hey bear! Hey bear!"

We both paddled hard again, managing to get a little traction on the current this time, but no matter: This bear ran off too.

**T**HE PICK-UP PLANE APPEARED LIKE AN INSECT from the southern sky, a tiny 1956 Stinson. Low off the river, the pilot dipped a wing and waved at us. Then he circled and disappeared. We found the plane parked around a bend on a gravel bar, midriver. Somehow that pilot had landed in the space of a hundred yards. He said he couldn't fly us out from right there — not enough room to take off with a load. So we paddled another two miles, stopping finally at a grassy airstrip near a hunting lodge. The plane was so small it took three round-trips to ferry us all back to Port Alsworth.

The following morning, after a good sleep and a long shower, I headed back to the airstrip for a second chartered flight to look at the mine site. Woody was there too, but she was climbing into a Bell JetRanger helicopter instead of joining us. She had identified a key weakness in the fight against the mine: Alaska law requires judges

and juries to consider the "best available scientific evidence," but in the case of the many remote creeks and rivers key to the Bristol Bay salmon fishery, there simply is no solid count of fish populations. For other waterways the only evidence comes from studies financed by the Pebble Partnership. So Woody had talked the Nature Conservancy into funding an independent survey. Waving goodbye, she lifted off in the chopper and headed back into the bush to count fish for a week straight.

For my part, I had our bush pilot circle the test site again, then set us down on the shores of the massive and pristine Lake Iliamna, annual spawning site for roughly 30 million salmon. As the pilot banked in low, he crossed Upper Tularik Creek, one of the greatest fly-fishing streams on Earth. No fewer than a dozen grizzlies hung out in the water, gorging on fish. We touched down right at the mouth of the creek. Spawning salmon were everywhere — hundreds upon hundreds of them — and down in the lake, where every loose salmon egg would drift, was an angler's dream: monstrous rainbow trout so unfamiliar with humans you could wade right up to them and drop a fly on their noses.

It reminded me of what I'd felt while flying to the headwaters of the Chilikadrotna, seeing those first bears and the first big clots of fish: that Alaskans may see the Pebble mine fight as a conflict between gold and salmon, extractive industry and sustainability; but to the rest of us, who may get up here only once or twice in a lifetime, it looks more like a painful choice between economic development and the knowledge that there's still a truly wild North America — like you grew up dreaming about and never thought you'd find — just a plane ride away. 🐻