

# In-Fisherman

## Great Lakes Salmon And Trout

### THE STABILITY ZONE

BY MATT STRAW

No bug slicks. No birds. Wind hums through lines and cables as the probe disappears into the blue-green depths. Foam trails are draped across the swells, some heading east, some heading west, some passing over a frenzy of kings. Because the probe says, somewhere nearby, thousands of salmon mill, cruise, and slash through pods of baitfish in an easily defined zone that, as yet, very few know how to define.



Mark Chmura, owner of Pier Pressure Charters, is one of the most insightful and instinctual captains we know of. In the past five years he's won 15 Tournament Trail events (T.T. is the top salmon-trout circuit on the Great Lakes). Over that period, Chmura's boat cruised to Team of The Year honors twice. He's been on the Luhr Jensen pro staff throughout his tournament career.

Wind-related patterns, big-lake currents, invisible thermal structure, and infra-red satellite maps are old school to salmon enthusiasts that follow In-Fisherman. Chmura combined that knowledge with observations made over his many years as a Great Lakes skipper to discover something relatively new to most weekend warriors and charter captains alike: A zone of stability that resists change and collects fish.

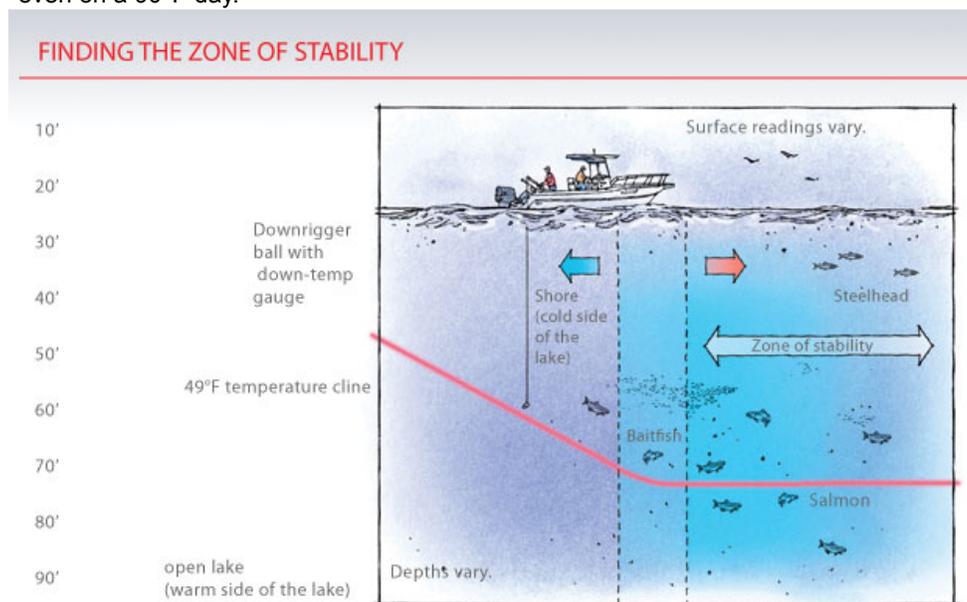
Storms cause upwellings in the Great Lakes. Heavy wind and wave action causes cold, dense water from the depths to flip over and supplant warmer surface water, pushing it out of the shallows on the wind-driven side of the lake. But somewhere out there exists a zone of stability that never flips over.

"That zone is always there," Chmura says. "If you look at a surface-temp map of Lake Michigan on the Internet, one side of the lake or the other will be warm and the other cold, unless we have no wind for days. The wind is constantly flipping the lake over. The stability-zone pattern is easier to follow on the cold side of the lake, because the zone is narrower and it concentrates fish a little more, plus it's not as far out in the lake on the cold side. Especially when fish get pushed right into shore."

## The Shadow Pattern

“A sudden storm with 6- to 8-foot waves coming into shore forces some salmon to the harbor mouth,” Chmura explains. “The water rolls over, and when the lake flips you’re dealing with ice water. Salmon react one of two ways. They go out deeper or they come in shallow. Kings and steelhead, months before spawning runs, collect around the harbor mouth and on very shallow structure surrounding it, when cold water is pushed into shore. When the wind comes out of the north, the warm water bounces off shore like a billiard ball. It gets pushed into shore, then it gets pushed out after an upwelling. That cold mass of water rising from the depths can be 42°F on top, pushing some fish right up on the beach, even in July. We target those salmon with longlines and boards in 10 feet of water, right in the middle of the day.

“In the case of a lesser upwelling, with lighter north winds or shorter duration, warm water remains in pockets like harbors, shoreline cuts, and bays. I run out just beyond the harbor after north-wind events and storms to drop a cannonball with a down-temp probe. If I run it down 20 feet and find 49°F to 52°F water, I know there are some kings in the harbor, even in the middle of summer—even on a 90°F day.



“If the wind stays out of the north for days, baitfish stay on the beaches and kings remain shallow. I’ve won several summer tournaments following this pattern. On our best day in shallow, right at the beginning of August, we ran #5 J-Plugs clean—no attractors—about 150 feet behind the boards at 4 mph. It was hot enough that it felt like fishing for tarpon in Florida. Kings were driving alewives into big, dark pools. We could see alewives streaking through the sides of the swells and flying into the air. The deepest water we fished that day was 10 feet and we had 12 fish for about 160 pounds by 11 a.m. As soon as the wind switches to the south, though, those shallow kings are gone.

“In shallow, I deploy zones of baits. In the close zone, or closer to the boat, I drop spoons back 45 feet on one side and 60 feet on the other with downriggers, and sometimes on the center rigger I have a lure back 100 feet. I drop the balls about 7 feet down when I want the lure to scuff bottom on the inside of a turn. Lures colliding with bottom, raising a cloud then dragging a plume along when pulled forward, produce massive strikes from kings at times. In the away zone, out to the sides, I run boards with J-Plugs dropped back 100 feet on the shoreward side and 150 feet back on the other.

“When the water starts to warm again in the shallows, the kings begin drifting out toward midlake. The harder a south wind blows, the faster kings retreat. When the temperature change is gradual, kings may hold in depths of 20 to 40 feet long enough to be approachable with leadcore on boards. I find that scenario with down-temperatures, too. Of course, all the familiar signs, like bug slicks, abrupt changes in surface temperature, and feeding birds provide all the reason you need to stop. But if I can find 49°F water with the down-temp probe, that’s my final assurance that kings will be there. I run spoons or J-Plugs clean (no

attractors) on five colors of leadcore. With 40 feet of mono, that rigging takes the lures 190 feet back and 20 feet down, perfect for picking off kings hovering in no-man's land when water temperatures are climbing slowly."

Patterns that develop inshore after storms and upwellings are just shadows of a larger, more consistent pattern. The flip side of the upwelling story occurs out in the infinite blue, where conditions rarely if ever change so rapidly.

## The Zone Of Stability

"The closer you are to the middle of the lake, the more stable it becomes," Chmura says. Within a few days after a storm, the water warming again in the harbors, he heads for the open sea, dropping a probe every few miles on the way out, looking for stable water. "After an upwelling, when the surface inshore is 42°F to 49°F, it starts warming up as you head toward midlake," he says. "I graph that temperature incline in reverse, watching the 49°F reading drop progressively deeper as I head out. Where it levels out, I've found the zone I want to explore. It could be in any depth range where it occurs, but it's generally 70 to 80 feet down during the heat of summer.

"On the other hand, when the lake is ice cold on one side, it's the opposite on the other. The cold side is always better than the hot side, because you don't have to fish as deep. The deeper you go, the less control you have. I caught kings last year 300 feet down, a few as deep as 350 feet, and a lot of them were over 20 pounds. But you can't fish two downriggers that deep. Currents tangle the cables no matter what you do. Sometimes you can only have one ball in the zone on the warm side, where you have to go deeper to hit fish."

A signpost is always waiting out there. "Water reading 49°F is my home," he says. "It's a critical indicator. The depth at the point where the water hits 49°F can direct you to salmon. When the 49°F mark is close to the surface and close to shore, count on kings being in the harbor. When it's deep, head out toward midlake and hunt for the spot where it begins to level off. The zone of stability begins where the 49°F temperature band stops getting deeper, where it levels off and remains relatively equidistant from the surface. That's where you want to start hunting for baitfish with sonar.

"When I find a feeding zone, I start with one lure below the 49°F reading and two lures above it on each side, using 3 downriggers and 4 wire-line rigs with Dipsy Divers. On the big boards, I've got one copper-line rig and one leadcore rig off each side, for a total of four more presentations. To get 60 feet down takes 15 colors of lead, so if the 49°F mark is 50 feet down, I run one with 15 colors and one with 10 or 12 colors to bracket that zone, at 2.2 mph." Chmura uses 27-pound leadcore, with 40 feet of 20-pound fluorocarbon on the business end.

"Steelhead generally stay in the top 20 feet of the water column out in the zone," he says, "even when the water warms. If you want steelhead, you have to go outside the box that works for kings." Typical setups for midlake steelhead include longlining minnowbaits or pulling a small dodger—Howie Fly rigs on straight mono with in-line weights or behind a couple colors of leadcore. Primarily, these rigs are trailed behind boards, Dipsy Divers, or both.

"Whenever you get 10 miles or so off the shoreline, the water is more stable. It resists flipping over and the conditions remain pretty constant. The edges of that zone flip, but not out in the middle. If the water out there describes a zone of stability, the water within 10 miles of shore describes the opposite or a zone of instability, because it's more vulnerable to rapid surface-temperature change. In the summer, steelhead hang out above that deep, stable water that won't be affected as much by wind-driven conditions and won't change temperature rapidly," he says.

"I came up with the stability-zone concept while steelheading at midlake. Three years ago, we found steelhead by using the same GPS coordinates at midlake all summer long. Day after day we noticed that the relative temperatures below us never changed, even though surface temps and bug slicks that originally attracted us to the spot were long gone. That demonstrates how stable conditions remain at the lake's center. The center of a truly huge lake adamantly resists change. It's like a teeter-

totter, fluctuating wildly in height at each end while staying precisely the same height in the center.”

The fringe of the zone moves in and out, relative to shore. It could be 8 miles out one day and 10 the next, but the edge is relatively easy to find with a down-temp probe, and it's where you want to set up camp—the place to be for consistent king salmon activity throughout the year (yes, that includes winter, and Chmura goes out there whenever conditions allow). Edges always produce fish, but in this case they also collect fish, almost by force. Baitfish retreating from flip-flopping conditions can pile up along the edges of the stability zone, where they get pushed along by the advance of cold water when the fickle wind shifts direction.

The key to finding and staying within the stability zone is simple: Down temp. “I'm constantly looking at my down temperature while fishing,” he says. “I would rather have my temp gauge than my graph. I use a Fish Hawk on my center downrigger, which is generally the one I run deepest. I'm constantly noting what the 49°F temperature cline is doing, and correlating it with the depths that produce strikes. That tells me everything I need to know. Down temp is a far better indicator for determining the depth of your presentation than a graph. It tells you precisely where the fish are biting. On a graph, you see all the fish, and can easily confuse the biters with the non-biters when the key temperature band is rising or falling in the water column.”

While the entire water column is more stable in the center of a big lake than it is near shore, the stability zone is primarily a sub-surface phenomenon. When air temperature fluctuates wildly and big winds persist, change can rage across the surface, even above the stability zone. The fringe of the area that changes least is found somewhere below the surface (but not far, as the near-constant presence of steelhead attests).

Finding the stability zone is one thing. No matter how good the spread or how well it's worked, the presentation program won't function properly without constantly monitoring down temps. Got kings? Get down (temp).