## FISH FARMING | TILAPIA

## Delivering farm fresh fish for frying pan

**Side business** | Grain farmer tries tilapia

## BY MARY MACARTHUR CAMROSE BUREAU

RUMSEY, Alta. — Diners who eat at a Chinese restaurant in Edmonton or choose their own fish live from a tank may be patronizing MDM Aqua-Farms.

In 1999, when the hog business began to falter, Sandy and Mark McNaughton changed their hog barn into a fish farm.

At that time, Alberta Agriculture was encouraging producers to look at alternative agriculture, including raising fish for stocking trout ponds.

They took the courses and began to raise trout in tanks inside their hog barn.

"We were very green to start with. We learned the hard way," said Mark McNaughton.

At the same time, the family began to farm more land, which made it tough to juggle spring seeding with the seasonal trout business.

In 2001, they switched from trout to tilapia for the fresh fish market in Edmonton. Tilapia is a bony fish, native to Egypt. It is hardy with tough scales, making it ideal for fish farms.

Just like hogs, tilapia is shipped weekly and seems to fit better with the 3,500 acre farm.

It's a steady year-round business, but a "bit of a pain" during harvest, he said.

Each Wednesday, the McNaughtons hand sort the fish that are ready for market into special holding tanks.

On Friday, 1,000 pounds of fish weighing 1 1/2 to two pounds each are picked up for delivery to Edmonton stores and restaurants.

McNaughton said he didn't understand the live fish market until he went to China, where customers want to see their food live before it is cooked.

"It's an entirely different food system. That's what drives this market."

Three times a year, McNaughton buys 20,000 young fish from his supplier in New Mexico or Idaho. Flying live fish in from the United States can be dodgy with delays and missed connections.

He said being a fish farmer means becoming a plumber and a chemist. Giant filters clean the water to ensure good water quality.

"Water quality is king," he said.

The water in each tank is continually recirculated and changes about once every 45 minutes.

"If the water stops moving, they're dead in an hour."

A family member is always on call in case of a problem. Back-up alarms alert the family to any problems in the barn and the 50,000 to 60,000 fish.

"You don't have much time if there is a mechanical or power failure."

The variable growth rate and adjustments made to the feed help stage the finishing of the fish to allow them to be ready for market throughout the year.

McNaughton said the operation wouldn't be viable as a stand-alone business, butitworks well as part of the grain farm.

He said the market is stable, but it is a small market easily subject to overproduction.

There are only three tilapia farms in Alberta, which raise enough fish to serve the entire Alberta market.





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Mark McNaughton of MDM AquaFarms of Rumsey, Alta., holds two tilapia he netted out of his fish tanks. Part of keeping the fish healthy is ensuring good filtration for the 50,000 to 60,000 fish. | MARY MACARTHUR PHOTOS

