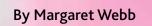
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Faced with a growing epidemic, Canada's Aboriginal communities look to lessons of the past in their fight against diabetes

A return to



cover feature



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he teens seemed safe enough. They hung out in the gravel parking lot outside the community's only store, snacking on pop and chips, flirting, teasing. With young love and adventure stirring the air, they hashed out plans to fill another long summer evening in South Indian Lake, a remote First Nations community in Northern Manitoba. Then they jumped on ATVs and roared off through the reservation, oblivious to the disease stalking them.



As she watched them, Jennifer Linklater squeezed back angry tears. The young Aboriginal diabetes worker, barely older than the teens, estimated that 50 to 80 percent of the adults in this community of 900 have type 2 diabetes, many undiagnosed. And the age of onset has been dropping. A 12-year-old was recently diagnosed. Linklater admits she's often overwhelmed by her work, and feels alone in her efforts to slow the onslaught.

"What's going to happen to my people?" she asked, as if the evening air might provide the answer.

But the teens' laughter and the roar of the ATVs faded. And silence set in.

T had travelled here with Dr. Shirley Thompson, a L University of Manitoba researcher, as well as a few questions of my own: Why do Aboriginal people suffer from diabetes at a rate three to five times higher than the general population? And were there lessons to be learned that might curb the diabetes epidemic here and in the rest of Canada?

Thompson and her team of graduate student researchers had a more specific task—to evaluate Manitoba's Northern Healthy Foods Initiative (NHFI). The project was launched in 2005, in response to high food prices in the north that resulted in hunger in many households. NHFI provides funding to 28 northern communities to build food self-sufficiency through

gardening, raising poultry, and encouraging a return to traditional wild foods. The long-term goal is to reduce chronic diseases, such as diabetes, by creating healthier local food systems.

The Canadian Institutes of Health Research, which has invested heavily in obesity, diabetes research and, increasingly, prevention, helped fund Thompson's research. As Thompson told me, "spending money on prevention, on good food, will save healthcare dollars down the road."

On this trip, we had planned to visit several fly-in communities but found ourselves facing another epidemic: H1N1. The flu was hitting remote communities hard, as many lack clean running water, adequate shelter and affordable healthy food, all essential for maintaining good health.

We hastily revised our itinerary to visit the drive-in communities of Wabowden, Leaf Rapids and South Indian Lake.

The food system is clearly failing when unhealthy food is not only more affordable, but also more accessible than healthy food.

Wabowden, a town of about 500, was relatively accessible, a four-hour drive north of Winnipeg and also served by rail. Still, the foodscape was dismal. One stroll through the grocery store and I wondered, how could anyone here not suffer from diabetes?

The produce section offered a scant selection of blackened bananas, old mealy apples, wilted broccoli and browning iceberg lettuce. Even the root vegetables were shrivelled, and frozen fruit and vegetables were in short supply. I couldn't stomach the thought of eating any of it, let alone paying the astronomical prices—three to six times more expensive than in southern grocery

stores. A brown, pock-marked head of cauliflower sold for \$11.

Yet, incredibly, the prices of highly processed food and junk food were on par with those in the south. And the shelves overflowed with the stuff.

The food industry likes to place responsibility-or blame—on individuals for making poor food choices, but the food system itself is clearly failing when unhealthy food is not only more affordable but also more accessible than healthy food.

The same situation exists in the south, most disturbingly around schools, in low-income neighbourhoods, along travel routes and even in hospitals, which are often served primarily by fast-food restaurants and convenience stores stocked with junk food. Indeed, Canadian agricultural policy aids in making such



University of Manitoba researcher Dr. Shirley Thompson

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The Aboriginal Diabetes Initiative estimates that the direct healthcare costs of people with diabetes will increase 75 percent between 2000 and 2016. For Canada, the share of healthcare costs attributed to unhealthy eating is now estimated to be more than \$6 billion a year—and rising.

poor food cheaper by providing more support to corn and soybean farmers who provide ingredients for the processed and junk food industries, while fruit and vegetable farmers must fend for themselves.

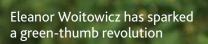
But if the diabetes epidemic ravaging northern communities can teach us one thing, it's that cheap food comes at a cost far dearer than we actually pay at the grocery store. The Aboriginal Diabetes Initiative estimates that the direct healthcare costs of people with diabetes will increase 75 percent between 2000 and 2016. For Canada, the share of healthcare costs attributed to unhealthy eating is now estimated to be more than \$6 billion a year—and rising.

To create alternatives to the poor food served up by its grocery store, Wabowden has embraced gardening. It used NHFI funds to purchase equipment and hire coordinators to help residents build some 45 gardens.

School teacher Eleanor Woitowicz has sparked a green-thumb revolution virtually on her own. Four years ago, she organized her Grade 4 class to plant 4-by-8-foot raised gardens at their homes. Now, the school has a 1,200-square-foot greenhouse that supplies starter plants to some 52 student plots. She also teaches her students to cook and preserve the harvest. And, this past summer, she worked with elders to plant a large community garden for potatoes, carrots and onions.

Woitowicz calls her efforts "horticultural therapy," addressing not only the diabetes crisis, but other challenges northern youth face. "All the virtues of character can be linked to gardening...it heals and builds a sense of community."

She hopes that in the future some students will take up farming and establish a farmers' market. That would mark a return to the local food system that once existed in Wabowden.



Community elder Florence Meade Hamilton, 92, a gardener all her life, said that in the past her parents and a few other families planted massive gardens and kept chickens and cattle while other families specialized in hunting and fishing. Families traded harvests and relied on the town store only for non-perishables such as tea and sugar. And the community was healthier for it. Florence's siblings all lived into their eighties and nineties—one even hit 101—and Florence danced at the Musher's Ball last year. "We never heard of diabetes back then," she said. "There was no sickness."



Wild berries are an important part of the traditional diet.

Ironically, her daughter, Frances, 75, also an avid gardener, developed

diabetes when she took a job teaching nutrition in schools. "I had to travel to communities two weeks a month, and I ate in restaurants that served a lot of greasy foods. I gained weight, and I developed diabetes about 10 years after that."

In the past, families traded harvests and relied on the town store only for non-perishables. And the community was better for it. "We never heard of diabetes back then."

Florence's granddaughter, Carol, who runs a restaurant in town, plans to expand her garden so that she can add fresh produce to her menus. But she wants policy changes to improve the food system—like junk food taxes to subsidize lower prices on healthy food. "It's going to be a fight to turn this around. But we have to. The majority of kids here are obese and a half dozen teens have developed diabetes."

The next day, we pushed onto Leaf Rapids, a 100-kilometre drive from Thompson, where we met up with graduate student Asfia Gulruhk. Residents had fondly awarded her the spirit name "Little Beaver," for the long hours she put in conducting household security surveys. She said gaining the trust of families took time, as they were reluctant to admit they could not afford healthy food for fear their children might be taken away.



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Keith Anderson turned his entire backyard into a garden



"This is about achieving food security, but also about developing communities, solving unemployment and improving food and health. This is about food sovereignty. We need to have a diverse food system controlled by people who eat the food."

"Little Beaver" made her rounds of local communities with the help of her driver and cultural guide, Keith Anderson, also a member of the local gardening team.

Anderson, who looks a decade younger than his 50 years, has turned his entire backyard into a garden. He told me that he first learned to garden when he was taken away from his family at age five to attend residential school—an experiment that traumatized both parents and children for generations and left a legacy of alcohol and drug addiction in its wake. It also interrupted the transmission of knowledge about local food production.

Luckily, Anderson's father taught him to hunt, fish and gather wild foods and medicines. Anderson lived many years in the bush and credits eating wild food for his good health. A commercial fisher, he and several regional fishers co-operatively own a fishing plant that they're trying to upgrade to improve processing capabilities.

Anderson believes local food production can achieve a range of positive outcomes for the north. "This is about achieving food security, but also about developing communities, solving unemployment and improving food and health. This is about food sovereignty. We need to have a diverse food system controlled by people who eat the food."

That afternoon, Anderson drove us out to the community where he grew up, South Indian Lake, an hourand-a-half trek over a gravel road. When Anderson was a boy, this was a prosperous fishing community with settlements on both sides of the lake. During summers, residents gardened and caught enough fish to export south. Winters, they crossed the frozen lake to hunt. Then the community was forced to relocate when a series of hydro-electric dams were built upstream, which raised the water level in the lake by more than 20 feet. That flooded traditional hunting grounds, devastated the fishery and increased mercury levels in the water, making it unsafe to drink.



"It's possible to eat healthy here, if we go back to that lifestyle of totally living off the land. We once had a balanced diet."

The community received compensation but never recovered. With the collapse of the Aboriginal and local food economy, many like Anderson left. Many who stayed now depend on social assistance and struggle with addictions and poverty. A survey revealed that 75 percent of households run out of money to buy food each month. As the only store in town, the Northern Store can get away with charging \$14.79 for a 10-pound bag of potatoes.



C hirley and Steve Ducharme are trying to re-introduce the youth of South DIndian Lake to more nutritious wild foods. Shirley is the school principal; Steve hunts, traps and fishes. On this evening, Steve was working in their greenhouse garden while Shirley was smoking fish in their backyard smoker. The sweet smell wafted through the air.

"It's possible to eat healthy here," Shirley says, "if we go back to that lifestyle of totally living off the land. We once had a balanced diet."

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Shirley and Steve Ducharme attend to their backyard fish smoker

The couple spends much of their free time gardening, hunting, fishing, and gathering wild berries and traditional medicines. "The economy of fishing and trapping was a lot of exercise," Shirley said. "Now, you have snowmobiles. There's not much activity. For large families on social assistance, it's difficult to stretch the budget to buy good food. There's a lot of junk."

The couple organizes survival courses to teach youth hunting and fishing skills, hoping to teach self reliance and a renewed appreciation for nutritious food.

"In the long run, we have to be self-sufficient, with the economy and fossil fuels going the way they are. The answer is gardening and producing our own food."

"The first time these kids eat wild food," said Anderson, "they just stare at it. Then they eat it and it's like they're starving for their own culture. They can't get enough."

A few families here have also started gardening, and elders planted a large communal plot on "Potato Island", where the community once gardened.

At harvest time, about 400 residents will travel to the island for a four-day "Looking Back" feast, organized by the young diabetes worker, Jennifer Linklater. Over feasting, elders will share stories of the wealth that fishing and trapping once brought to the community, perhaps inspiring a new generation to embrace traditional foods.

Dack at Leaf Rapids, we met up with Chuck **D**Stensgard, a former southerner who taught high school here for 35 years before retiring to become a gardening coordinator. He has designed several greenhouses, seeded a wide variety of plants and experimented with growing techniques-all to see what works best in the north. He has also collected traditional medicines to grow in his garden.

Chuck is determined, he says, to leave behind a legacy of plants to feed the north. But a huge challenge, he admits, is just getting First Nations people interested in growing their own food. "They understand traditional medicines," he says. "Many still gather traditional medicines. I tell them, look: the healthy food growing in gardens is good medicine."

Stensgard and Anderson are also frustrated by the slow pace of the healthy foods initiative. "In the long run, we have to be self-sufficient, with the economy and fossil fuels going the way they are. But we have the answer. The answer is gardening and producing our own food. But this (initiative) isn't making enough of a difference. We're chasing time. We should have been doing this yesterday."

As we left Leaf Rapids, Thompson said her report would recommend the government start a good food box program to deliver healthy foods into communities,

"If you spend at the Northern Store, the money leaves the community. If you spend a dollar on local food production in the community, it will recycle six times. This has the potential to rebuild communities. "People are making the connection between diabetes and food and they're pushing for healthy food. If we can invest in gardening now, it will lead to a huge savings in healthcare costs later."

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as retailers were clearly failing. She would also suggest making NHFI a permanent program, available to more communities, and with more funding to scale up local food production.

"People are making the connection between diabetes and food and they're pushing for healthy food. If we can invest in gardening now, it will lead to a huge savings in healthcare costs later."

Margaret Webb is a freelance writer based in Toronto, Ontario, and is the author of Apples and Oysters: A Food Lover's Tour of Canadian Farms.



