



BACKGROUND

S4 Greenhouse Ltd.'s original greenhouse was built in 1986 in Lacombe, Alberta. After the original owners retired, the business was sold to newcomers Albert and Kim Schermers, in 2014. They expanded their operation with a new tomato greenhouse in 2021, and currently, they grow tomatoes year-round and peppers, beans, lettuce, and cucumbers seasonally.

CHALLENGES

For the new 2021 project, the Schermers were looking for an intelligent system that used collected rainwater and spring run-off to irrigate and fertigate their new tomato greenhouse efficiently and effectively.

As with any large project, it can be challenging for all the different moving parts to work together smoothly. There were various trades on-site to work with, deadlines to meet and a budget to follow. It can be challenging to coordinate an irrigation designer, installer and supplier without hiccups on top of all the non-irrigation trades.

“We rate Southern Irrigation a 10/10!

They will be our first and only call for systems in the future.”

- Albert Schermers
S4 Greenhouses





TURN-KEY SOLUTION

S4 Greenhouses chose Southern Irrigation to take care of their greenhouse irrigation project because of Southern Irrigation's previous experience with turn-key greenhouse projects such as, Prins Greenhouses and Randhawa Greenhouses. Southern Irrigation's complete turn-key solution includes everything; design, installation, supply, and after-care maintenance.

"The quote was presented very clearly and very thoroughly. We knew Southern Irrigation understood exactly what we wanted and needed the system to achieve. We knew we could count on them since their turn-key system is their brand. We know that if something was not functioning properly, Southern Irrigation would make sure to fix the issue." says Albert Schermers.

Southern Irrigation installed the following:

- a freshwater tank
- a custom-built irrigation pump unit
- a dirty recirculation tank
- two irrigation zones
- a treated recirculation tank.

The water used for this irrigation system is collected through spring run-off and a rainwater collection system and stored in a dugout. The recirculation system captures excess irrigation, disinfects it through a filtration system, and then stores it in a large holding tank.

The large, custom-built irrigation pump station is used to house the various pumps and fertilizer injectors necessary to supply the operation. The irrigation zones in the growing area consists of drip lines with CNL dripper assemblies, feeding the tomatoes to the end of the rows. The row gutters collect the excess irrigation and send it back to the dirty recirculation tank for treatment and reuse. Other efficiencies include the pumps on VFD drives which are energy smart, and drip irrigation - known to conserve water.

FUTURE PLANS

The Schermers are hopeful for the future, and plan to expand their operation by adding additional acres of growing area to their current greenhouse.

"We rate Southern Irrigation a 10/10! They will be our first and only call for systems in the future."

"There were no surprises. They completed ahead of schedule and on budget. Very stress-free."