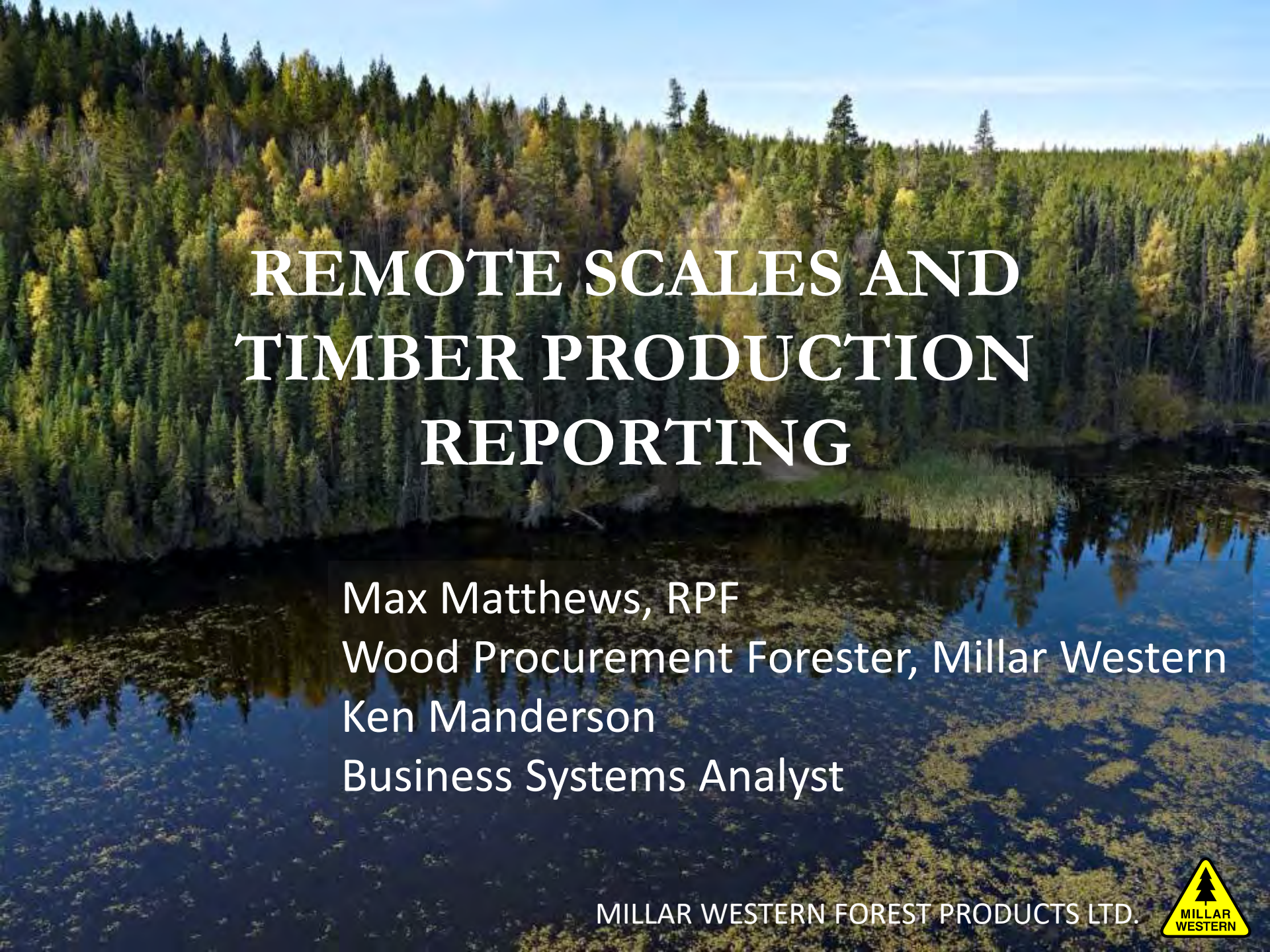

REMOTE SCALES AND TIMBER PRODUCTION REPORTING

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Business Systems Analyst

MILLAR WESTERN FOREST PRODUCTS LTD.

Outline

- Company overview
- What is a remote scale
- Why remote scales?
- Government requirements
- Pioneer in remote scale reporting
- Setting up a remote scale
- Advantages
- Computer setup
- Operation and troubleshooting

Company Overview

Millar Western

- Privately held business with more than 100 years of history and experience
- Largest Alberta-based forest products company
- Producer of lumber, pulp, bioenergy and specialty wood products at facilities in Whitecourt, Fox Creek and Acheson
- Skilled, dedicated workforce of 680; hundreds more employed on a contract basis in various areas, including harvesting, hauling and reforestation
- Conduct our business in accordance with our values of safety, integrity, honesty, trust and respect
- Family-oriented culture that encourages innovation and collaboration
- Strong commitment to investing in our people, forests, facilities and communities

MILLAR WESTERN

What Is A Remote Scale?

- A fully functional weigh scale set up in a location outside the primary manufacturing facility
- Not to be confused with an Offsite Timber Storage Area
- Capable of recording and tracking volumes of delivered timber for payment of timber dues.

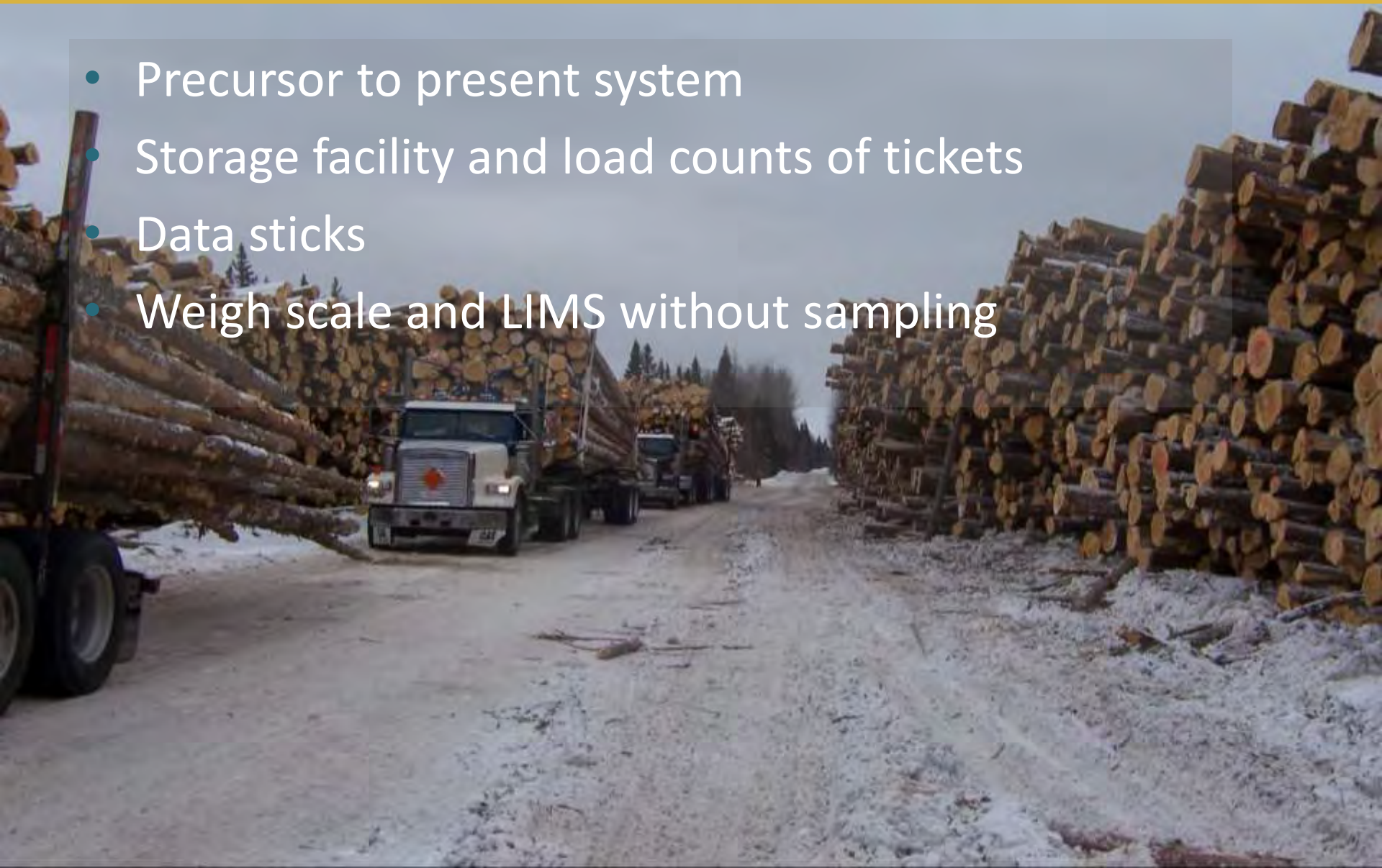
Why Remote Scales?

- Reduce winter haul traffic
- Limited log truck availability
- Additional log storage space
- Early spring makes it hard to deliver all wood if long distances to mill
- Provide summer work for trucks

Government Requirements

- Alberta Agriculture and Forestry must approve site
- Approved weigh scale certified by the Federal Weights and Measures Branch
- Capable of operating as a man-less system
- Tracking and reporting of all loads delivered
- Adequate samples taken to establish a weight-to-volume ratio

Pioneer in Remote Scale Reporting

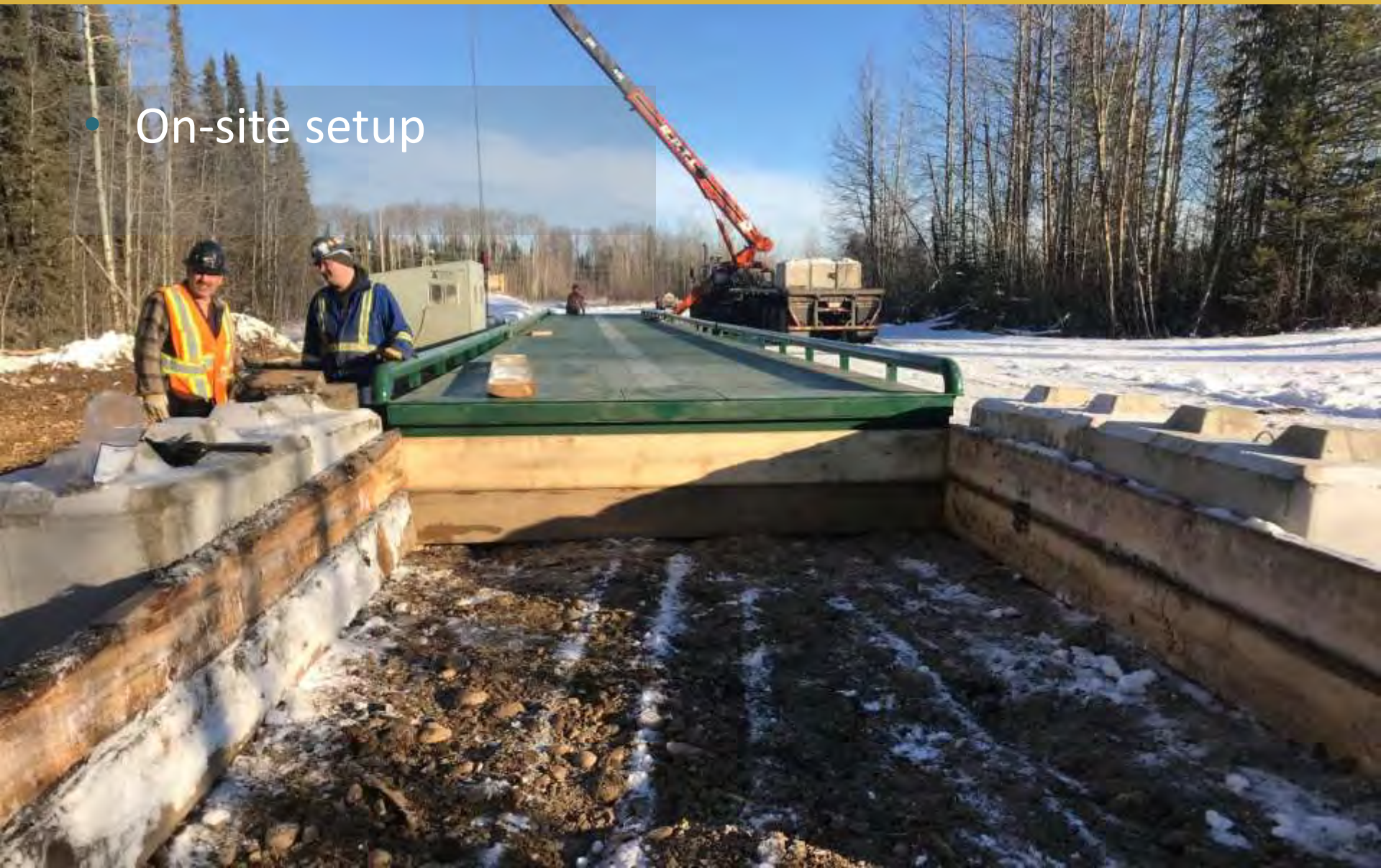


- Precursor to present system
- Storage facility and load counts of tickets
- Data sticks
- Weigh scale and LIMS without sampling

Remote Scale Set-up

- Transporting components

Remote Scale Set-up



- On-site setup

Setting Up a Remote Scale

- Completed scale

Remote Scale Operation

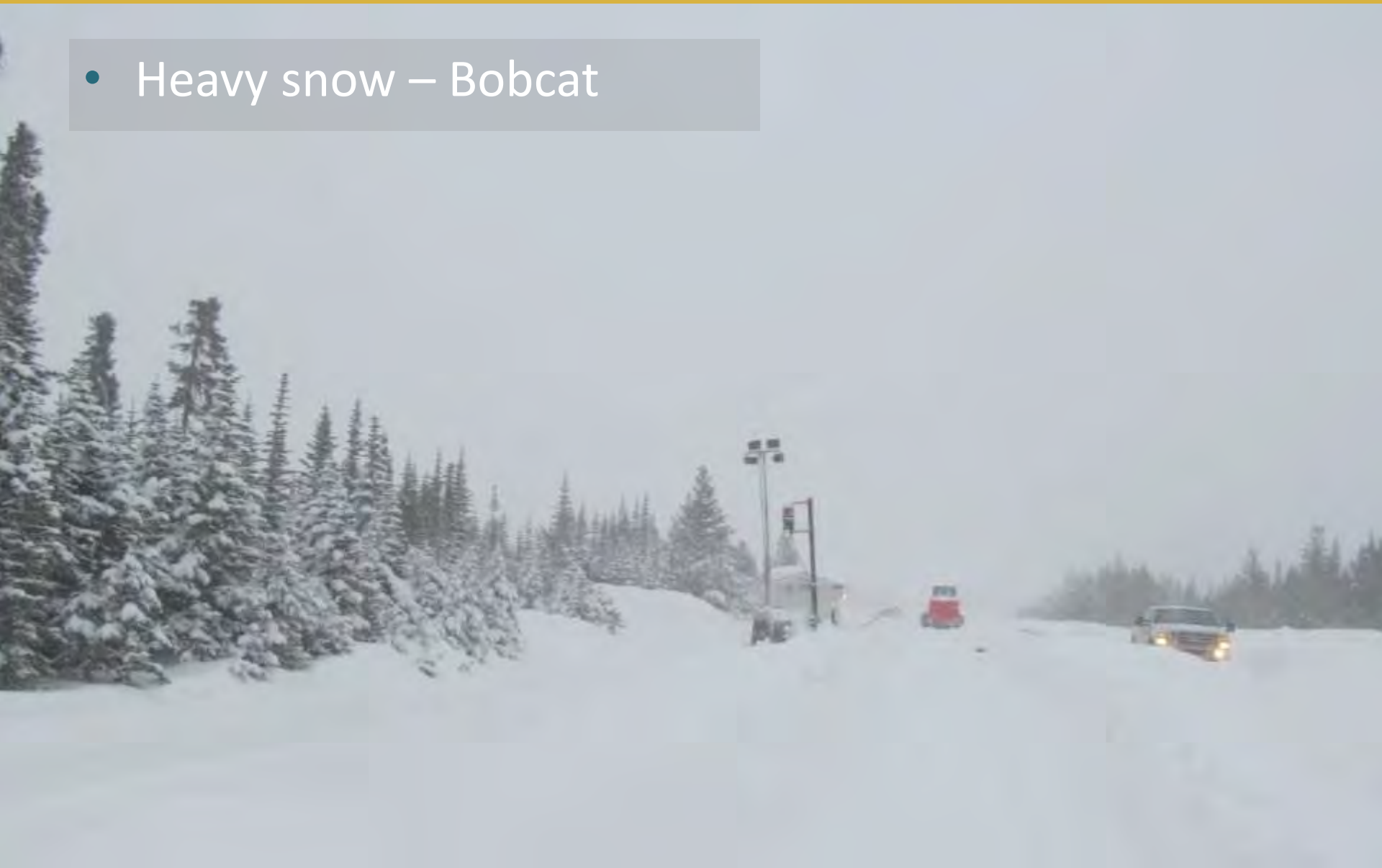
- Requirements:
  - Generator
  - Lights and score board
  - Photo eyes – to ensure truck is on scale
  - Camera system

Scale Maintenance

- Cleaning scales – very important

Scale Maintenance

- Heavy snow – Bobcat



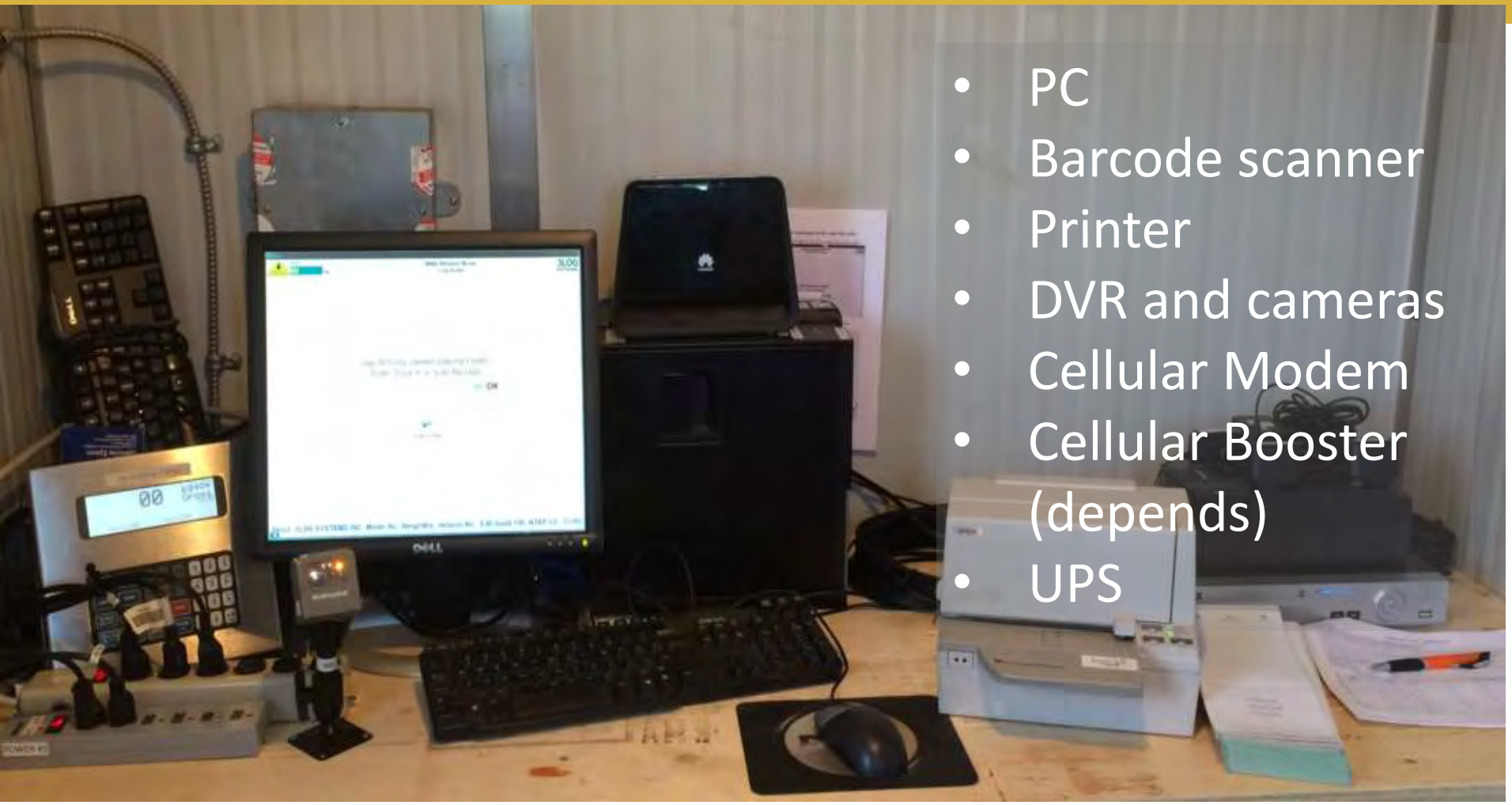
Advantages of Remote Scales

- Allow for real time reporting
- Can reconcile volumes to government at year end
- Less volume variance with bush scale to yard scale

Remote Scales

- Typical setup
- Basic premise
- Changes in how we communicate with the computer at the scale
- Tools we use
- Example to troubleshoot

Typical Setup



- PC
- Barcode scanner
- Printer
- DVR and cameras
- Cellular Modem
- Cellular Booster (depends)
- UPS

Load Ticket Generation

- LoaderWiz produces trip ticket at the loader

Millar Western Forest Products
Whitecourt Wood Products Div.
5004 - 52 Street Whitecourt AB T7S 1N2
Telephone: (780)778-2221

MW00361262

Source / Disp: MEE-17 / FMA9700034
Destination: Goose Satellite Scale
Truck / Cfg / Lic: J99942 / 8TL / J99942
Species / Form: Spruce Pine (Alberta) / CTL
oader / Skidder: L15 / S15
Lat. / Long.: 54.73742 / -116.06684
Loading Date: 2018-01-18 23:52
TM9 #: MW00361262

.oader Operator: George

Trucker

White - Office, Green - Contractor, Blue - Loader, Pink - Truck

Basic Premise of our Weigh Scale Software

- Loaded truck is weighed
- Unload the logs
- Empty truck is weighed. Net weight calculated
- Base data set up in LIMS
- Scale does not need LIMS connectivity to weigh trucks
- All data is chosen from drop down lists or scanned from bar codes
- 4000 loads across 3 different scales since Jan 1
- 12 wonky loads discovered from HO (0.3%)
- What could go wrong?

History in How We Transfer Data

- Base data (LIMS to Scale) and load data (Scale to LIMS)
- 1) Memory stick and run scripts – physical visit to scale
- 2) Cellular modem on a stick
- 3) High quality cellular modem

- Load data is available minutes after truck weighed

Tools to Help When Things Don't go Smooth

- Keystroke log shows keys pressed, barcodes scanned, buttons clicked on
- Details of weight on scale regardless of what driver is doing
- 3 cameras (2 outside, 1 inside) with playback ability (residential quality)

Keystroke Log

Ws LoadID	Ws Ticket	SourceID	In	Out	TruckID	Gross	Tare	Net
2500	MW00379026	101-1869-ANC	9:35	9:52	WBLL574641	75190	69960	5230
2503	MW00379027	101-1869-ANC	10:12	11:09	WBLL560677	69960	21100	48860

9:35	Barcode scanned: START_TM9[54.10828[-117.13471[[031618[0814[MW00379026[LMW[[101-1869-ANC[
	FMA8900026[[[[[[CTL[SP[[[[L23[S21[BERNIE[[[WBLL574641[10TBT[L574641[[[N[KNIGHT[END_TM9
9:35	OK button clicked. Enterd text:
9:35	Session finished : {C082C119-D677-47C8-9CD3-51C0E887AE26}
9:35	Next button clicked
9:35	Scale Direction Weighin Weight 75190 KG
9:35	Field: ; Value:
9:35	Display Lookup Field: Driver; Value:
9:35	Next button clicked
9:35	Field: Driver; Value: 5945
9:35	Display CheckBox Field: Is Cleanup Load; Value: N
9:35	Next button clicked
9:35	Field: Is Cleanup Load; Value: N
9:35	Confirmation Screen shown
9:35	Yes button clicked
9:35	Big Message shown : Please Place Ticket in Printer.... Then Press Ok Button
9:51	Barcode scanned: START_TM9[54.10827[-117.13494[[031618[0829[MW00379027[LMW[[101-1869-ANC[
	FMA8900026[[[[[[CTL[SP[[[[L23[S21[BERNIE[[[WBLL574641[10TBT[L574641[[[N[KNIGHT[END_TM9
9:51	OK button clicked. Enterd text:
9:51	Session finished : {D9A4871E-DDCD-450F-B337-DC7DC8D60A54}
9:52	Next button clicked
9:52	Scale Direction Weighout Weight 69960 KG

Details of Weight

DATE_TIME	WEIGHT	IN_OUT	WS_LOADID
3/16/2018 9:33:54.	75310		
3/16/2018 9:33:55.	75250		
3/16/2018 9:33:55.	75290		
3/16/2018 9:33:55.	75330		
3/16/2018 9:33:55.	75300		
3/16/2018 9:34:01.	75280		
3/16/2018 9:34:01.	75270		
3/16/2018 9:34:02.	75300		
3/16/2018 9:34:02.	75270		
3/16/2018 9:34:20.	75250		
3/16/2018 9:34:20.	75240		
3/16/2018 9:34:23.	75210		
3/16/2018 9:35:06.	75190	I	2500
3/16/2018 9:35:44.	75230		
3/16/2018 9:35:44.	75240		
3/16/2018 9:35:46.	75270		
3/16/2018 9:36:06.	75290		
3/16/2018 9:36:06.	75300		
3/16/2018 9:36:10.	75280		
3/16/2018 9:36:11.	75910		
3/16/2018 9:36:11.	72120		
3/16/2018 9:36:11.	68960		
3/16/2018 9:36:11.	68800		

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QUESTIONS?

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