

# SYSTEM UTILIZATION AND RELIABILITY MONTHLY REPORT

**for the month ending  
February, 2007**

*Published date:*  
**December 18, 2007**

---

## **Highlights This Month:**

- Average Load Factors greater than 90% were experienced in a number of design areas during November, 2006 – February 2007 [i.e. Upper Peace River, Upper and Central Peace River, Peace River Design, Rimbey/Nevis, North of Bens Lake, North and South of Bens Lake, Upstream James River, Eastern Alberta Mainline: James River to Princess, Eastern Alberta Mainline: Princess to Empress/McNeill and South and Alderson].
- FT Receipt Availability over a 3 month average from December 1, 2006 – February 28, 2007 was deemed to be 100% available in all pipe segments.
- Border Availability at Empress/McNeill, Gordondale and Alberta/BC, over a 3 month average from December 1, 2006 – February 28, 2007, were all deemed 100% available.

**NOVA Gas Transmission Ltd.**

# TABLE OF CONTENTS

---

<b><u>MONTHLY FEATURES</u></b>	<b>PAGE</b>
Firm Transportation Service Contract Utilization .....	3
Design Flow Requirements Utilization	
North of Bens Lake .....	4
North & South of Bens Lake .....	5
Upper Peace River .....	6
Upper & Central Peace River .....	7
Peace River .....	8
Marten Hills .....	9
Edson M/L, Peace River, & Marten Hills .....	10
South & Alderson .....	11
Rimbey Nevis .....	12
Eastern Alberta Mainline (James River to Princess) .....	13
Medicine Hat .....	14
Eastern Alberta Mainline (Princess to Empress/McNeill) .....	15
Western Alberta Mainline (AB/BC & AB/Montana Borders) .....	16
Historical Transportation Service Availability (3 Month Average) .....	17
Future Firm Transportation Service Availability .....	18
How to Use This Report .....	19
 <b><u>REFERENCES</u></b>	
NGTL Design Areas Map .....	21
NGTL Pipeline Segments Map .....	22
Definition of Terms .....	23

If you have any questions on the content of this report, contact Bob Haney at (403) 920-5317 or via fax at (403) 920-2380. If you wish to address a question at the FLC meeting, call Bob one week prior to the next meeting. Generally, meetings are scheduled for the second Wednesday of every other month (ie. Jan, Mar, May, etc).

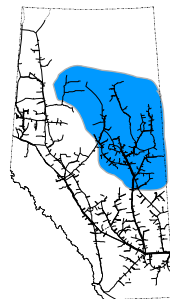
# FIRM TRANSPORTATION SERVICE<sup>1</sup> CONTRACT UTILIZATION<sup>2</sup>

By NGTL Pipeline Segments

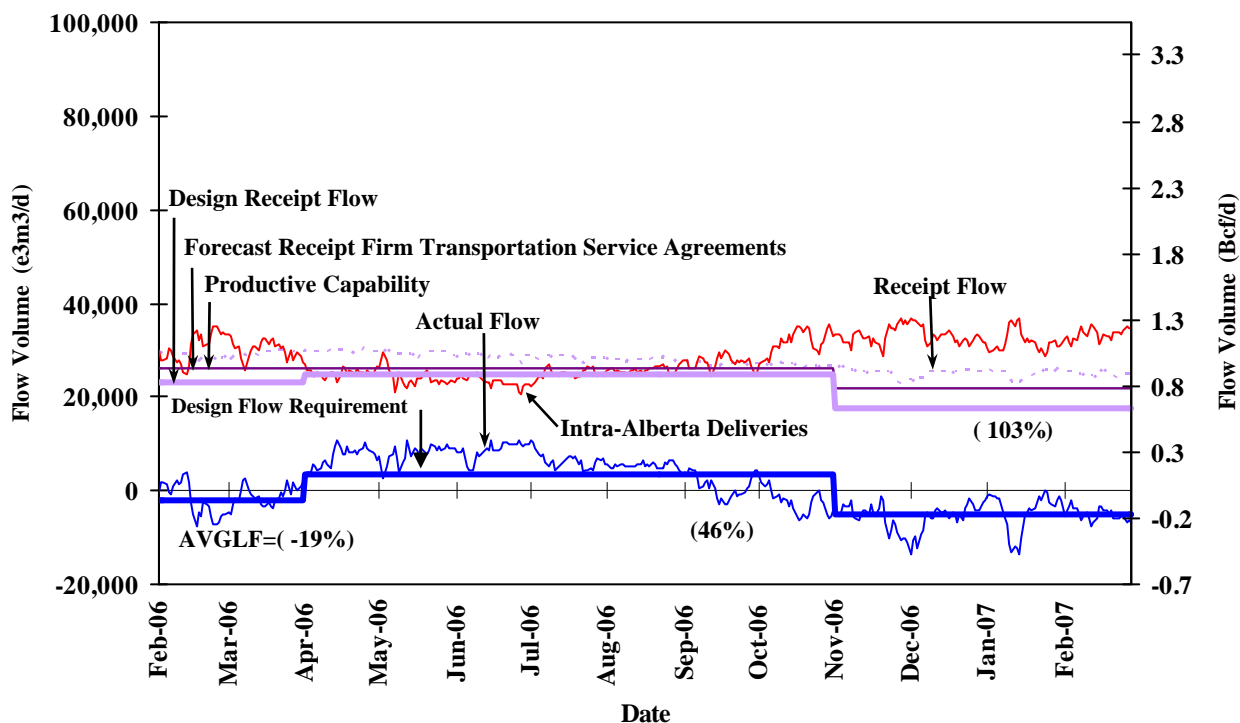
Segment	Receipt Contract	Sep-06	Oct-06	Nov-06	Dec-06	Jan-07	Feb-07	Feb CD (m mcf/d)
UPRM <sup>4</sup>	FT	71%	90%	86%	88%	88%	87%	216
	FT + IT	74%	98%	90%	92%	92%	91%	
LPRM <sup>4</sup>	FT	77%	95%	95%	94%	88%	92%	26
	FT + IT	99%	127%	128%	129%	130%	133%	
PRL <sup>4</sup>	FT	72%	84%	85%	88%	88%	92%	235
	FT + IT	81%	102%	101%	109%	111%	112%	
NWML <sup>4</sup>	FT	87%	93%	90%	93%	93%	94%	549
	FT + IT	90%	100%	95%	98%	100%	101%	
GRDL <sup>4</sup>	FT	95%	94%	92%	85%	90%	93%	324
	FT + IT	111%	113%	110%	109%	112%	126%	
WRSY <sup>4</sup>	FT	73%	94%	93%	94%	89%	92%	46
	FT + IT	100%	135%	148%	146%	134%	131%	
WAEX	FT	88%	90%	84%	88%	83%	89%	304
	FT + IT	162%	137%	131%	137%	124%	136%	
JUDY	FT	91%	91%	95%	96%	96%	98%	112
	FT + IT	113%	114%	123%	122%	126%	124%	
GPML	FT	94%	93%	90%	93%	94%	95%	1,954
	FT + IT	113%	108%	106%	106%	108%	109%	
CENT	FT	95%	97%	94%	96%	95%	96%	1,228
	FT + IT	117%	117%	110%	112%	111%	110%	
LPOL	FT	94%	92%	91%	94%	94%	92%	480
	FT + IT	125%	118%	118%	120%	122%	120%	
WGAT	FT	94%	95%	94%	95%	94%	94%	462
	FT + IT	115%	109%	113%	116%	109%	111%	
ALEG	FT	89%	88%	86%	88%	88%	87%	1,305
	FT + IT	116%	105%	102%	105%	103%	102%	
SLAT	FT	93%	90%	88%	85%	84%	85%	371
	FT + IT	118%	111%	110%	110%	104%	103%	
MLAT	FT	97%	97%	98%	96%	96%	95%	325
	FT + IT	111%	110%	112%	108%	105%	105%	
BLEG	FT	93%	96%	96%	97%	97%	97%	664
	FT + IT	113%	113%	109%	109%	107%	107%	
EGAT	FT	96%	98%	95%	97%	92%	94%	66
	FT + IT	116%	117%	110%	114%	106%	107%	
MRTN	FT	87%	88%	86%	86%	87%	87%	204
	FT + IT	100%	102%	99%	100%	101%	102%	
LIEG	FT	84%	84%	71%	73%	73%	74%	115
	FT + IT	125%	123%	122%	118%	115%	115%	
KIRB	FT	80%	80%	77%	72%	83%	80%	135
	FT + IT	104%	99%	98%	96%	135%	122%	
SMHI	FT	92%	93%	90%	90%	91%	90%	101
	FT + IT	126%	128%	154%	153%	155%	147%	
REDL	FT	84%	89%	88%	89%	85%	93%	92
	FT + IT	136%	136%	127%	134%	130%	142%	
COLD	FT	83%	80%	77%	77%	78%	84%	76
	FT + IT	126%	119%	116%	114%	106%	105%	
NLAT	FT	92%	93%	92%	93%	93%	90%	395
	FT + IT	121%	125%	124%	126%	121%	115%	
WAIN	FT	92%	89%	84%	85%	85%	87%	22
	FT + IT	129%	129%	124%	126%	127%	127%	
ELAT	FT	90%	92%	89%	88%	90%	91%	237
	FT + IT	128%	131%	126%	127%	129%	129%	
TOTAL SYSTEM	FT	91%	92%	90%	91%	92%	92%	10,042
	FT + IT	113%	112%	110%	111%	110%	111%	
Segment	Delivery Contract	Sep-06	Oct-06	Nov-06	Dec-06	Jan-07	Feb-07	Feb CD (GJ/d)
Em press	FT	99%	99%	99%	99%	100%	99%	4,933,283
	FT + IT	130%	134%	124%	113%	121%	123%	
M cNeill	FT	96%	96%	97%	94%	91%	99%	2,012,774
	FT + IT	100%	116%	113%	100%	102%	113%	
A B C	FT	81%	74%	68%	92%	95%	88%	2,628,615
	FT + IT	81%	75%	68%	93%	102%	89%	

**\*NOTE:**

1. FT includes all receipt and export delivery Firm Transportation Services: FTR, LRS FTD.
2. IT includes all receipt and border delivery Interruptible Services: ITR, FRO, ITD, FDO.
3. Utilization data is based on billed monthly volumes. Percent utilization calculated as FT and FT + IT billed volumes divided by applicable receipt or delivery Contract level.
4. Boundaries for pipe segments UPRM, LPRM, PRL, NWML, GRDL and WRSY changed in November 2000.



# DESIGN FLOW REQUIREMENTS UTILIZATION NORTH OF BENS LAKE

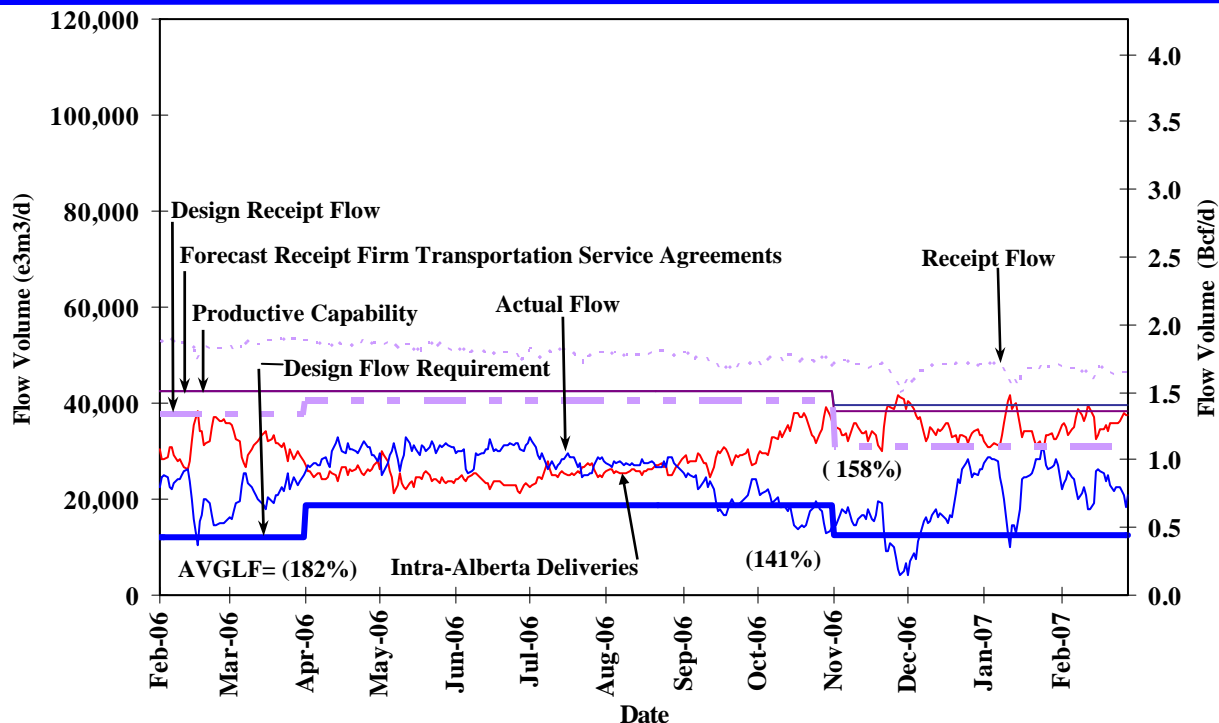
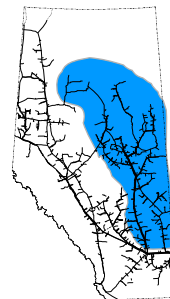


% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT-R Volume	80	81	101	100	97	100
FT-R + IT Volume	109	107	142	142	141	141

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	27	-71	112	111	88	100

# DESIGN FLOW REQUIREMENTS UTILIZATION NORTH & SOUTH OF BENS LAKE



## % Design Receipt Utilization

(Notice: The Percentages are not the same as the Contract Utilization Percentages)

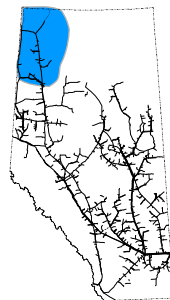
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	89	90	109	109	108	110
FT-R + IT Volume	121	122	152	153	152	151

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

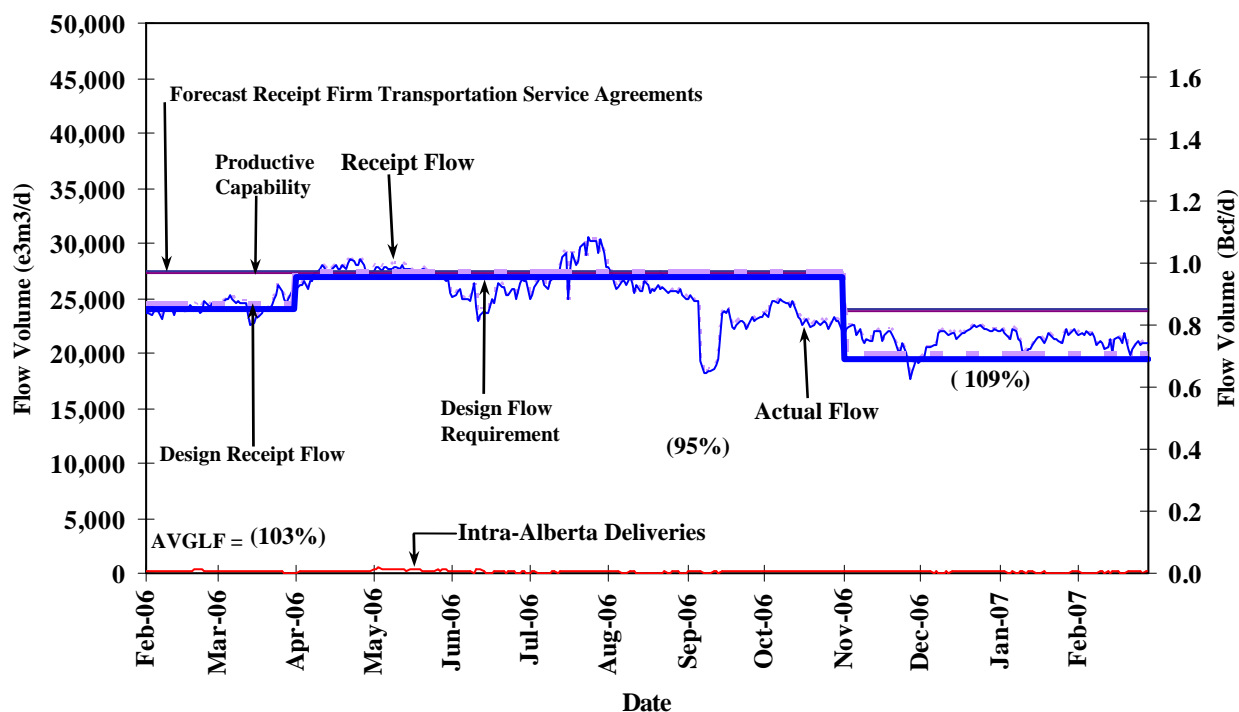
## % Design Flow Requirements Utilization

Monthly Average Actual Flow as a Percentage of Design Flow Requirements

	Sep	Oct	Nov	Dec	Jan	Feb
Average Flow/ Design Capacity	116	95	111	147	195	181



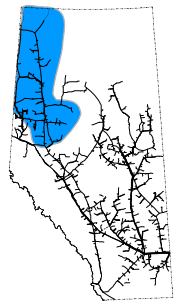
# DESIGN FLOW REQUIREMENTS UTILIZATION UPPER PEACE RIVER



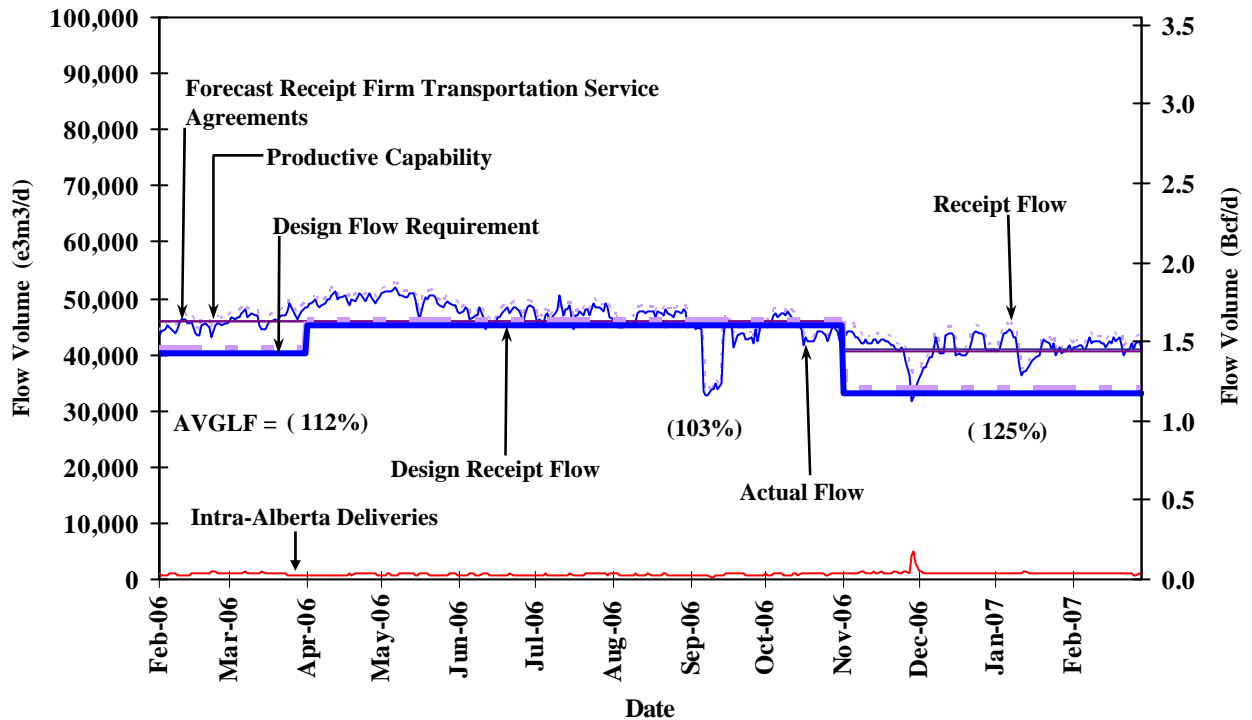
% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	78	80	102	105	102	100
FT-R + IT Volume	81	86	107	110	109	107

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	82	87	108	111	110	108



# DESIGN FLOW REQUIREMENTS UTILIZATION UPPER and CENTRAL PEACE RIVER

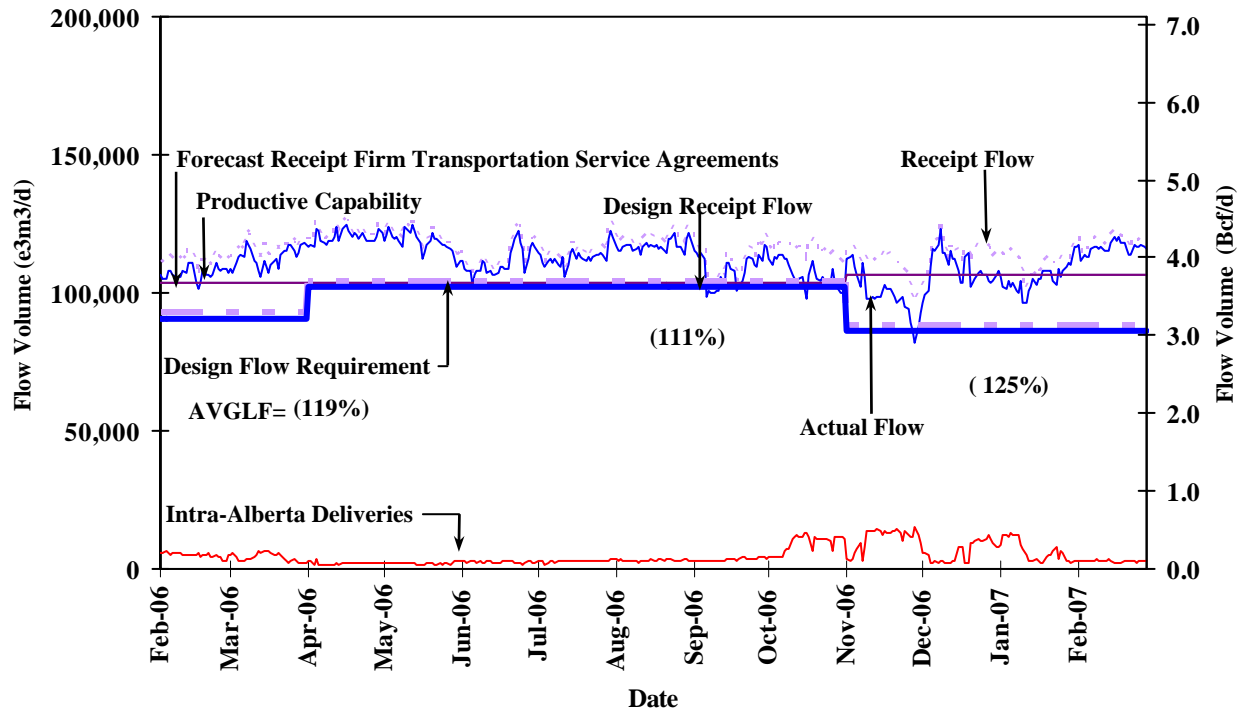
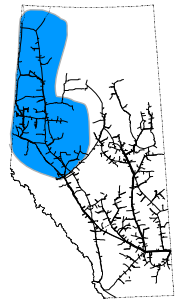


% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	84	87	112	109	107	108
FT-R + IT Volume	92	100	127	125	124	127

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	91	99	125	124	124	127

# DESIGN FLOW REQUIREMENTS UTILIZATION PEACE RIVER

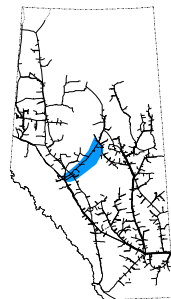


% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	89	94	106	109	108	110
FT-R + IT Volume	108	112	126	128	127	130

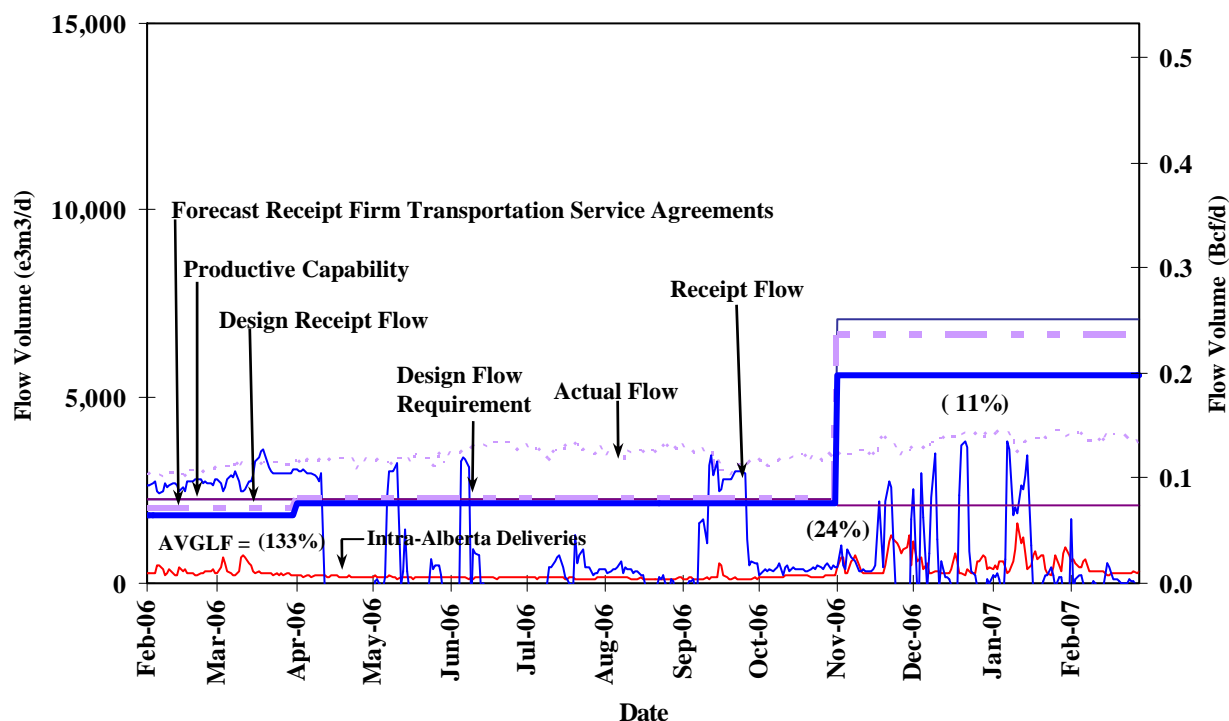
**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	106	105	116	126	122	135





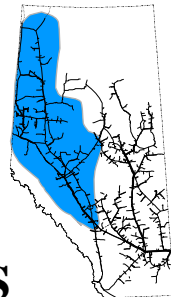
# DESIGN FLOW REQUIREMENTS UTILIZATION MARTEN HILLS



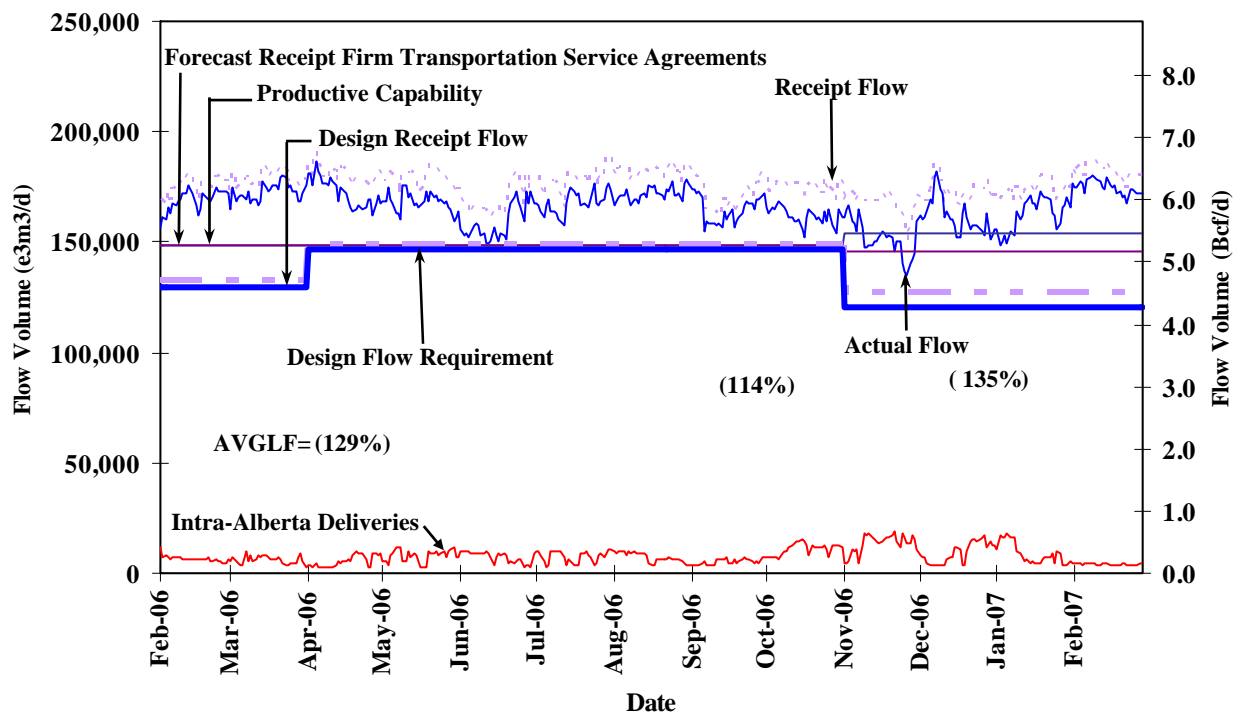
% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	119	119	47	52	51	53
FT-R + IT Volume	147	149	61	66	67	67

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	82	18	10	17	15	2



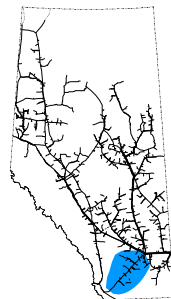
# DESIGN FLOW REQUIREMENTS UTILIZATION EDSON M/L, PEACE RIVER, AND MARTEN HILLS



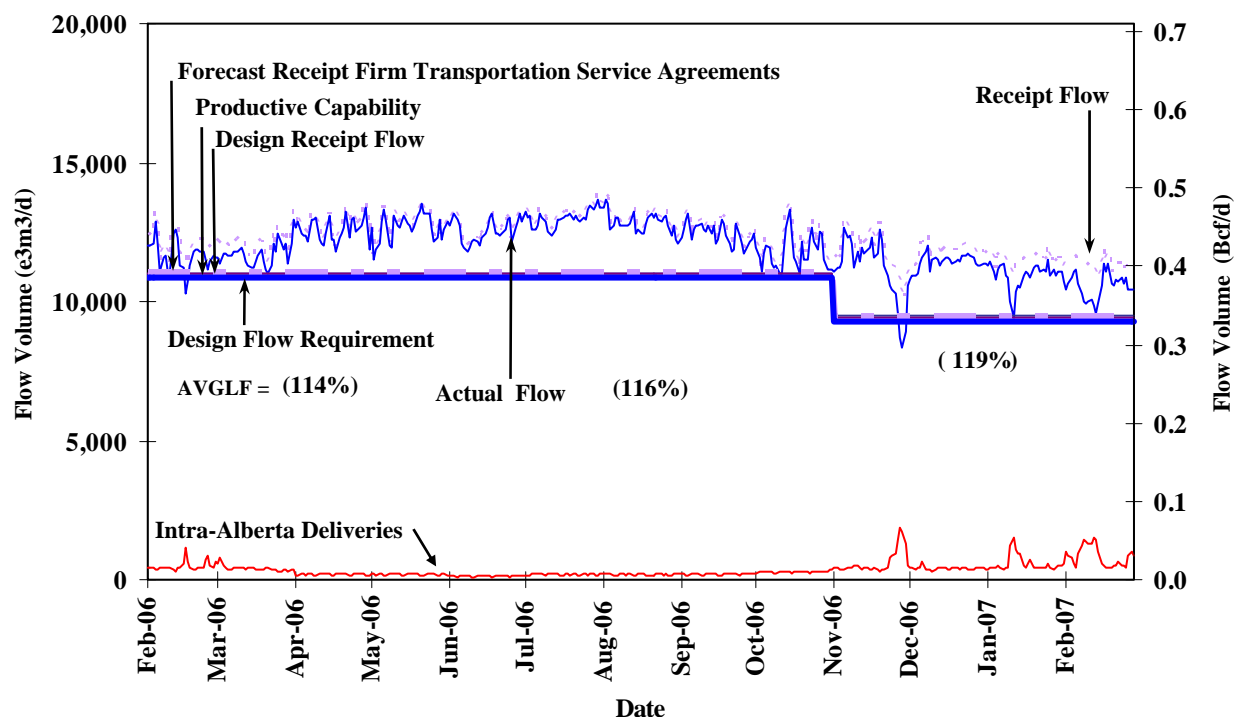
% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	91	95	107	110	109	111
FT-R + IT Volume	112	115	128	131	130	132

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	112	111	126	134	136	145



# DESIGN FLOW REQUIREMENTS UTILIZATION SOUTH AND ALDERSON

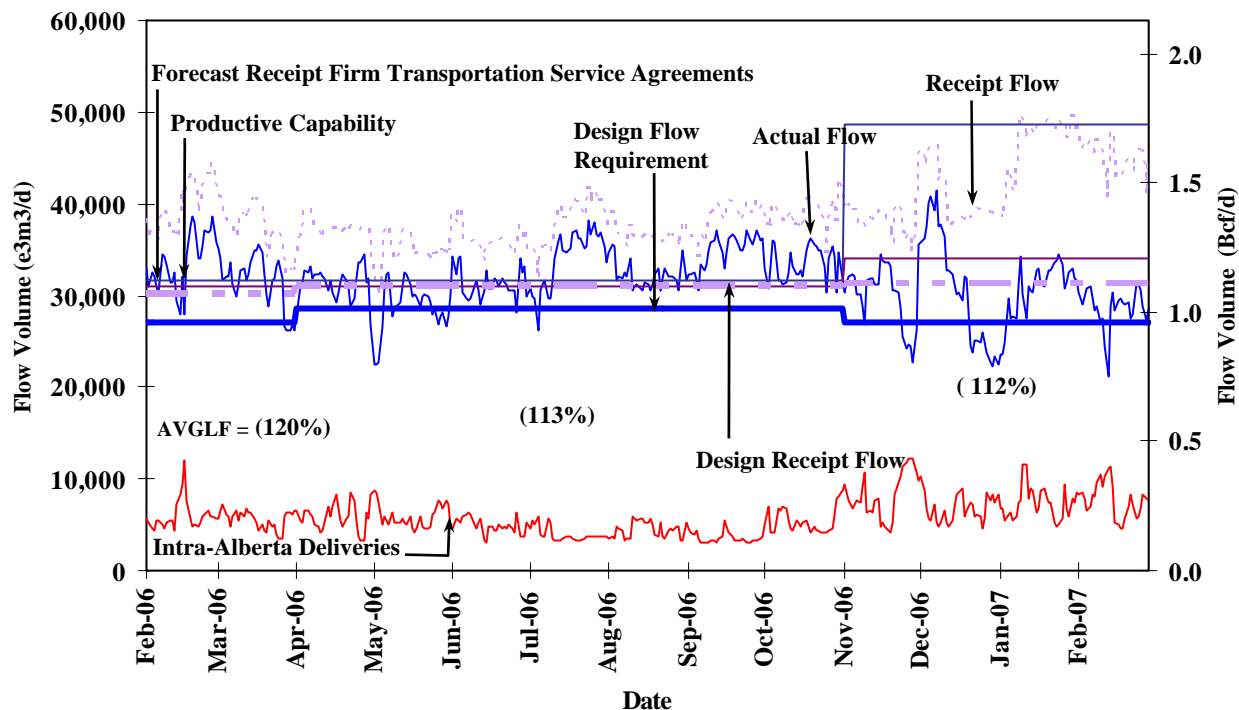
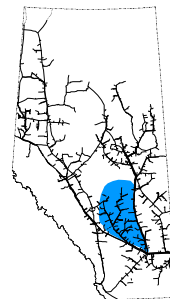


% Design Receipt Utilization						
(Notice: The Percentages are not the same as the Contract Utilization Percentages)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	90	88	100	96	99	99
FT-R + IT Volume	114	109	125	126	123	121

**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

% Design Flow Requirements Utilization						
Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	114	108	121	123	118	114

# DESIGN FLOW REQUIREMENTS UTILIZATION RIMBEY-NEVIS



## % Design Receipt Utilization

(Notice: The Percentages are not the same as the Contract Utilization Percentages)

	Sep	Oct	Nov	Dec	Jan	Feb
FT Volume	102	105	100	103	104	102
FT-R + IT Volume	133	126	118	122	122	120

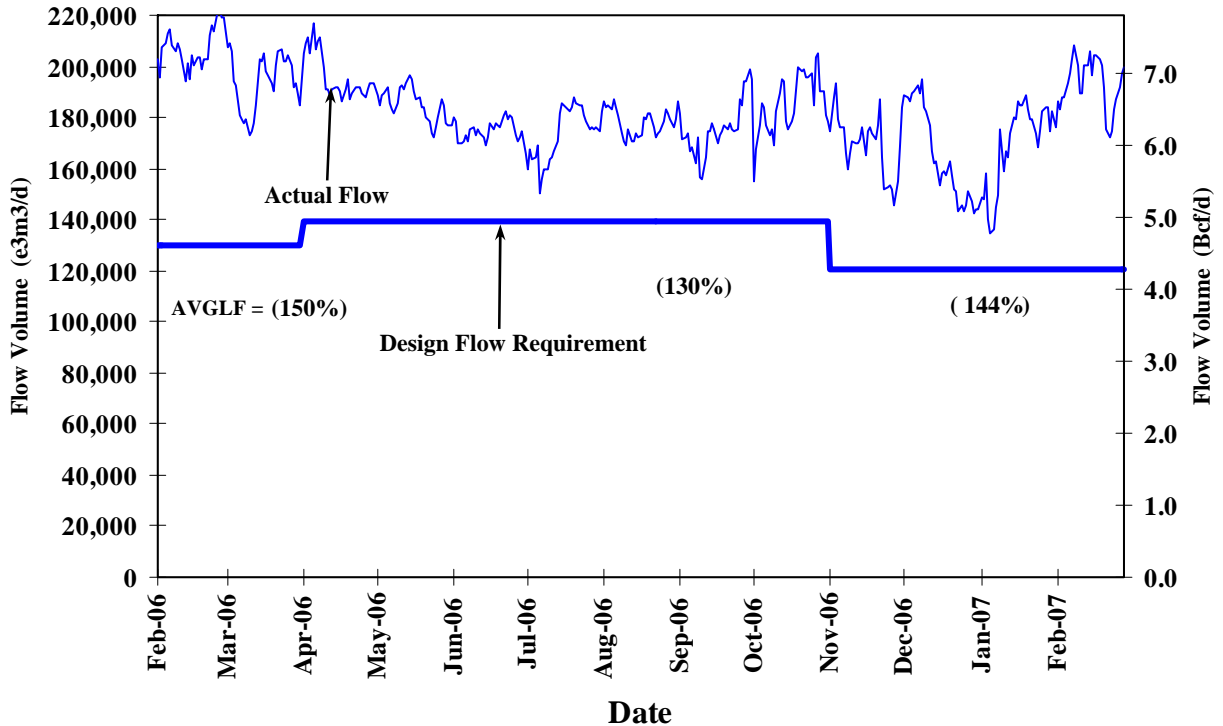
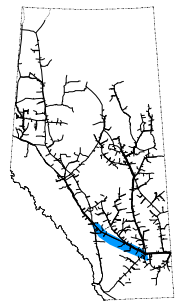
**NOTE:** Utilization data is based upon billed monthly volumes expressed as a percentage of design receipt flow. Design receipt flow is the amount of receipt flow for which the area was designed.

## % Design Flow Requirements Utilization

Monthly Average Actual Flow as a Percentage of Design Flow Requirements

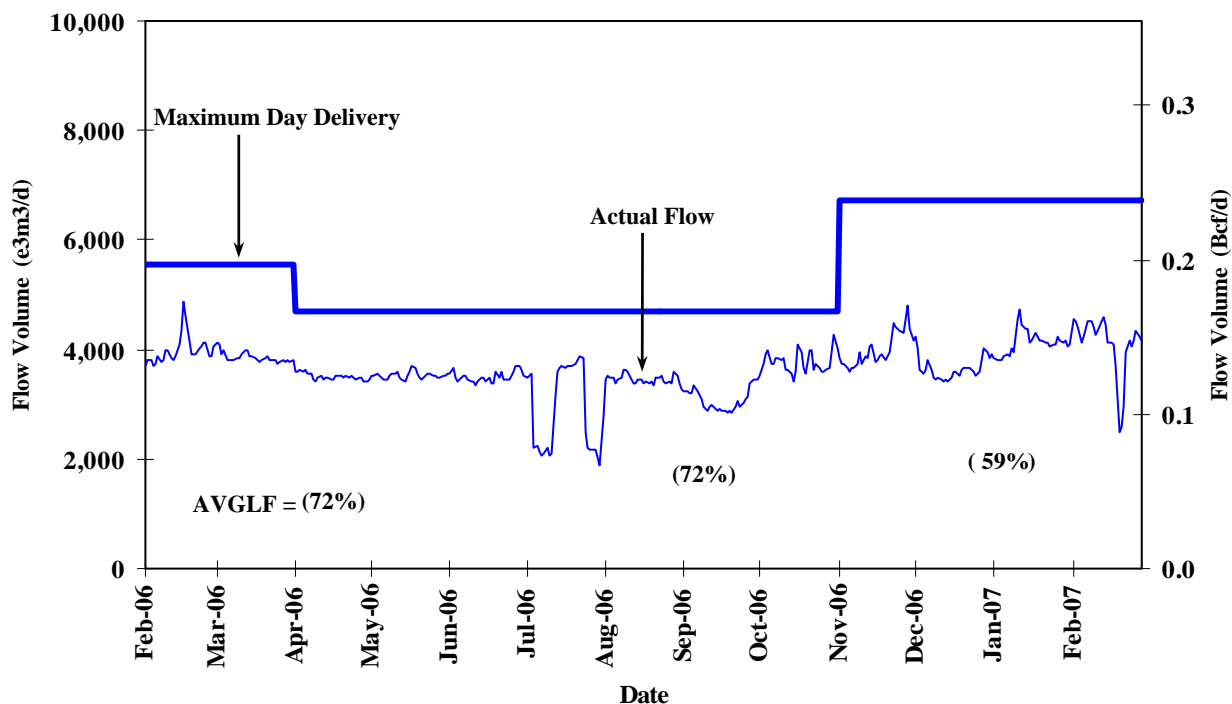
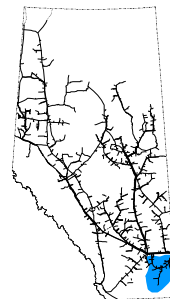
	Sep	Oct	Nov	Dec	Jan	Feb
Average Flow/ Design Capacity	122	117	112	114	114	107

# DESIGN FLOW REQUIREMENTS UTILIZATION EASTERN ALBERTA MAINLINE (James River to Princess)



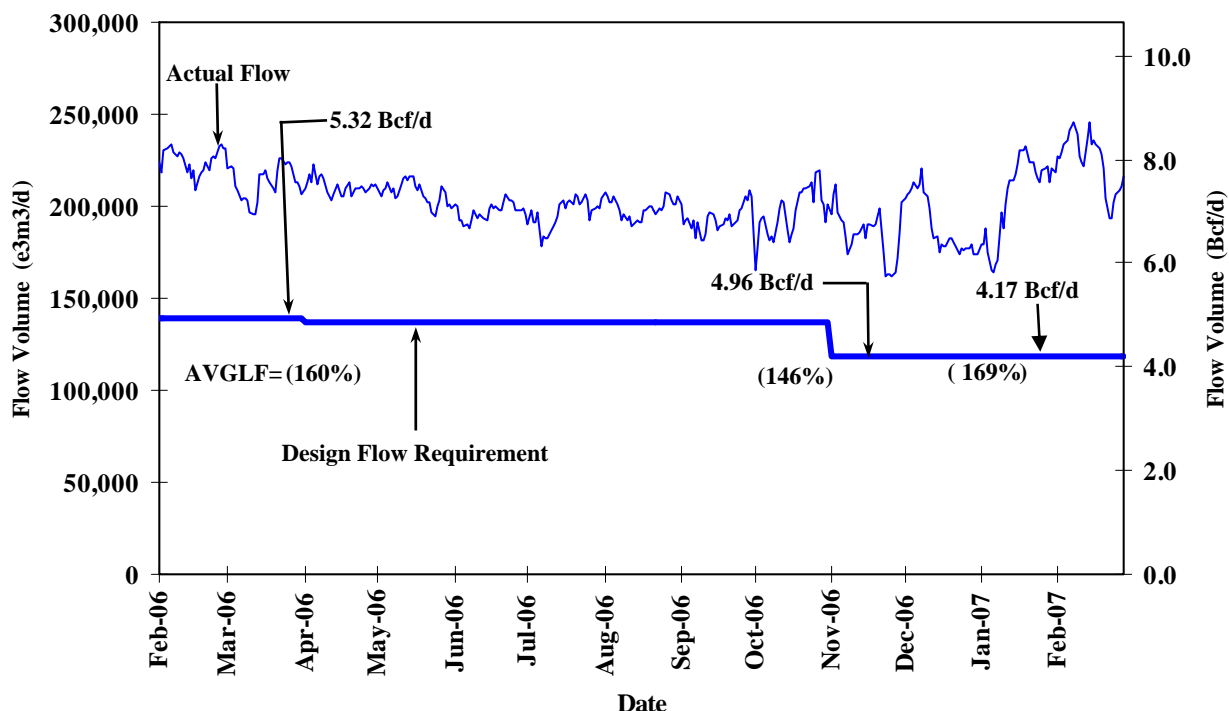
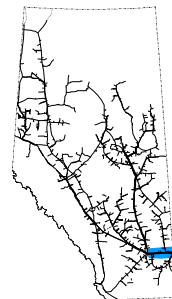
% Design Flow Requirements Utilization Monthly Average Actual Flow as a Percentage of Design Flow Requirements						
Average Flow/ Design Capacity	Sep	Oct	Nov	Dec	Jan	Feb
	126	133	140	137	140	160

# DESIGN FLOW REQUIREMENTS UTILIZATION MEDICINE HAT



Design flow for the Medicine Hat area is the net flow to the area deliveries. Since all deliveries are intra-Alberta deliveries there are no Firm Service Delivery contracts in effect for this area. Consequently, contract utilization values are not available.

# DESIGN FLOW REQUIREMENTS UTILIZATION EASTERN ALBERTA MAINLINE (Princess to Empress / McNeill)



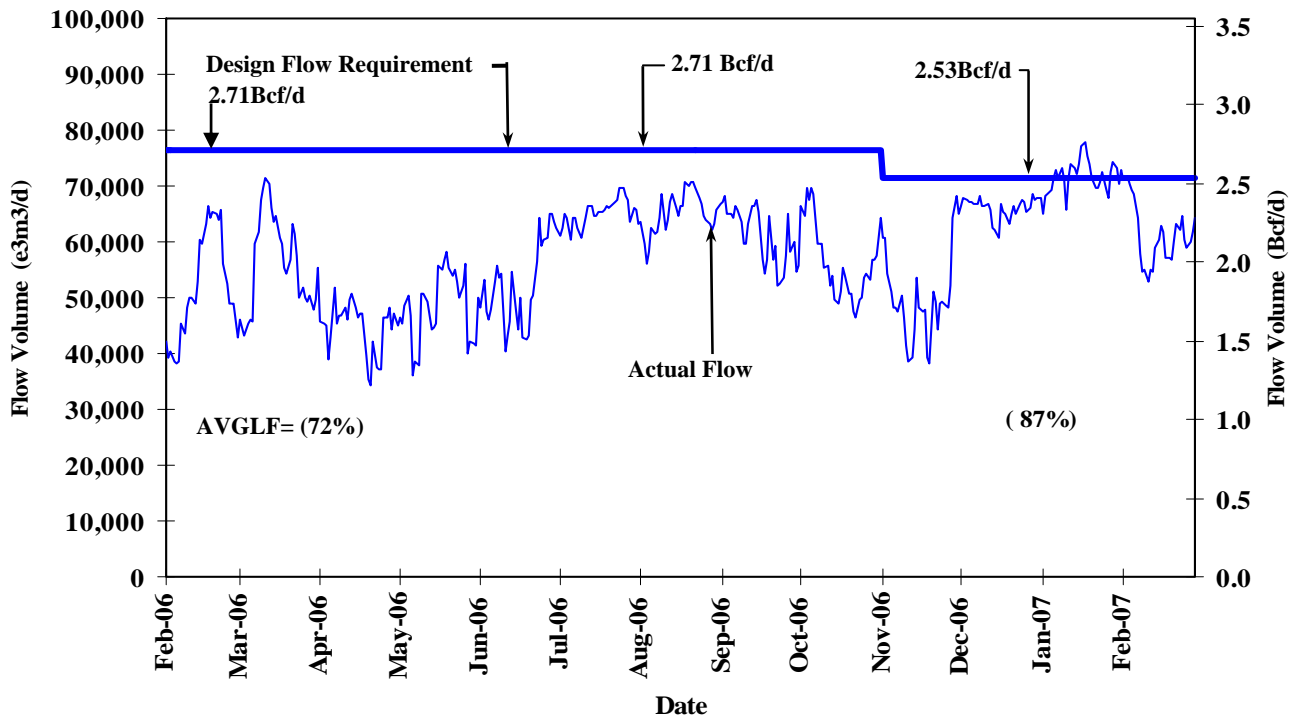
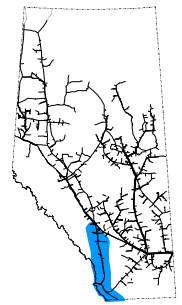
% Design Delivery Utilization (Notice: Average Actual Flow as a Percentage of Design Flow Requirements)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT <sup>1</sup> Volume	114	107	127	143	146	155
FT <sup>1</sup> + IT Volume	138	140	156	160	173	187

## NOTE:

Utilization data is based upon billed monthly volumes expressed as a percentage of seasonal design delivery flow at Empress and McNeill Export delivery points.

1. FT includes year-round FT-D, STFT and LRS.

# DESIGN FLOW REQUIREMENTS UTILIZATION WESTERN ALBERTA MAINLINE (Alberta/B.C. and Alberta/Montana Borders)



<b>% Design Delivery Utilization</b> (Notice: Average Actual Flow as a Percentage of Design Flow Requirements)						
	Sep	Oct	Nov	Dec	Jan	Feb
FT <sup>1</sup> Volume	79	73	69	91	93	85
FT <sup>1</sup> + IT Volume	80	74	70	93	100	86

## NOTE:

Utilization data is based upon billed monthly volumes expressed as a percentage of seasonal design delivery flow at Alberta/BC and Alberta/Montana Export delivery points.

1. FT includes year-round FT-D, STFT and LRS.



# HISTORICAL TRANSPORTATION SERVICE AVAILABILITY

December 1, 2006 to February 28, 2007 (3 Month Average)

Receipt Area	Segment	IT-R Service	Firm Service	Firm Service	% CD	
		Available	Available	Restriction	Restricted <sup>(1)</sup>	
		(% of time)	(% of time)	(% of time)	Max	Average
Peace River	UPRM 1	100	100	0	0	0
	PRLL 2	100	100	0	0	0
	NWML 3	100	100	0	0	0
	GRDL 4	100	100	0	0	0
	WAEX 5	100	100	0	0	0
	JUDY 24	100	100	0	0	0
	WRSY 26	100	100	0	0	0
	LPRM 27	100	100	0	0	0
	GPML 7	100	100	0	0	0
Central	CENT 8	100	100	0	0	0
	LPOL 9	100	100	0	0	0
North & East Upstream of Bens Lake	LIEG 10	100	100	0	0	0
	KIRB 11	100	100	0	0	0
	MRTN 6	100	100	0	0	0
	SMHI 12	100	100	0	0	0
	REDL 13	100	100	0	0	0
	COLD 14	100	100	0	0	0
Downstream of Bens Lake	NLAT 15	100	100	0	0	0
	ELAT 16	100	100	0	0	0
	WAIN 23	100	100	0	0	0
Rimbey/Nevis	ALEG 17	100	100	0	0	0
Eastern Mainline	BLEG 18	100	100	0	0	0
	EGAT 19	100	100	0	0	0
	MLAT 20	100	100	0	0	0
	SLAT 22	100	100	0	0	0
Western Mainline	WGAT 21	100	100	0	0	0

Borders	Available <sup>(2)</sup> (% of time)	IT-D Service	Firm Service	Firm Service	% CD Restricted <sup>(1)</sup>	
		Available <sup>(2)</sup> (% of time)	Available (% of time)	Restriction (% of time)	Restricted <sup>(1)</sup>	
		(% of time)	(% of time)	(% of time)	Max	Average
Empress/McNeill		100	100	0	0	0
Alberta-BC		100	100	0	0	0
Gordondale		100	100	0	0	0

(1) Percentage of CD restricted during periods of restriction.

(2) Represents percent of time full IT-D nominated available, does not include availability during partial restrictions.

(3) Pertains to FS Restrictions.

# FUTURE FIRM TRANSPORTATION SERVICE AVAILABILITY (MAINLINE RESTRICTIONS)

## Export Firm Transportation Guidelines

Firm Transportation Service Type	Authorize Firm Transportation Service By	To Ensure Firm Transportation Service By
Export Delivery	August 1, 2006 August 1, 2007	November 2007 November 2008

## Receipt Firm Transportation Guidelines

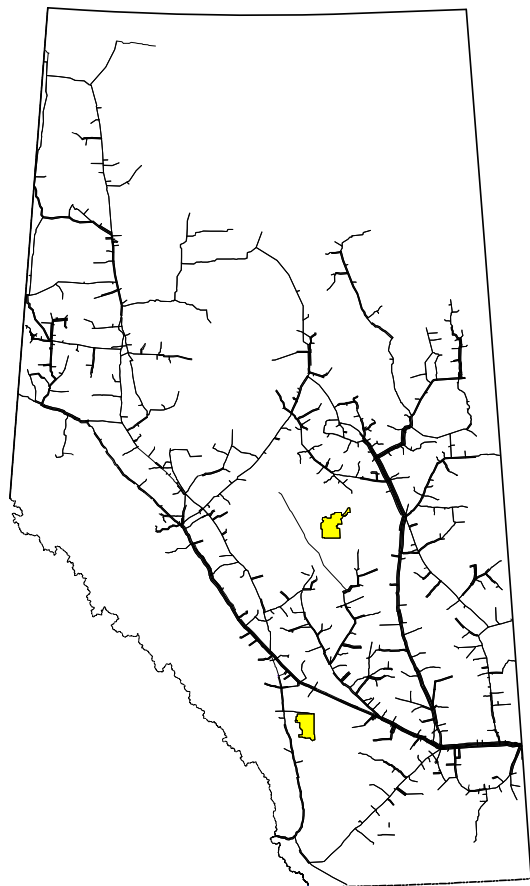
Firm Transportation Service Type	Authorize Firm Transportation Service By	To Ensure Firm Transportation Service By
Receipt - Summer construction (generally south of Edmonton)	November 1, 2006 November 1, 2007	November 2007 November 2008
Receipt - Winter construction (generally north of Edmonton)	April 1, 2006 April 1, 2007	April 2007 April 2008

➤ If your needs for firm transportation service arise after the above dates to “Authorize Firm Transportation Service By”, NGTL will evaluate your new receipt firm transportation service or firm service transfer requests on a date-stamped basis.

*Please consult with your Customer Sales Representative to discuss your Firm Transportation Service needs.*

## Estimated Firm Transportation Service Availability as of December, 2006

(last revision November 2005)



Firm Transportation - Receipt Lead Time

# HOW TO USE THIS REPORT

---

## **Overview**

This report contains recent historical information on the level of utilization of firm transportation Service Agreements on the NGTL system, relative usage of interruptible service, level of utilization of design pipeline capacity, and the availability of transportation services as an indication of system reliability.

Data is reported either by *Pipeline Segment* (24 on the system) or *Design Area* (11 on the system). Maps of both are included in the reference section.

## **Firm Transportation Service Contract Utilization**

The Firm Transportation Service Contract Utilization report shows the percent utilization for each of the 24 NGTL pipeline segments and 3 major export delivery points comprising the total system. The utilization data is based on billed monthly volumes. Percent utilization is calculated as firm transportation service and firm transportation service + interruptible service divided by applicable receipt or delivery contract level. Historical Data involving billed volumes lags the current date by approximately two months.

## **Design Flow Requirements Utilization**

The load factor/segment flow graphs show actual flow versus design values for various NGTL system areas. For comparison, the graphs also include design area receipt firm transportation service agreements and productive capability. The graphs also show seasonal (summer/winter) design flows and average load factors for each season. Data used in these reports lags the current date by one month.

Design Flow Requirements utilization is a function of several factors that include:

- Total market demand for Alberta natural gas.
- Seasonal changes in market demand for Alberta natural gas.
- Receipt nominating practices of customers individually and in aggregate to meet that level of demand.
- Effect of scheduled maintenance on actual flow requirement in a design area at any given time.
- Design assumptions used in determining required segment flow requirement.

# HOW TO USE THIS REPORT - continued

---

## **Historical Transportation Service Availability**

Transportation Service Availability is a system utilization measure that identifies the degree to which firm and interruptible transportation services are available on the NGTL system. It includes the historical frequency of service restriction experienced by the gas transmission network by service type and by pipeline segment.

The data shows the percentage of a given time period that a service type was available for a given section of the system. Service availability less than 100 percent means that some level of transportation service has been restricted for a portion of the time period.

Priority of transportation service on the NGTL system is firm transportation service, and then interruptible (IT). If transportation is restricted within a segment, all service within that segment of a lower priority will be affected.

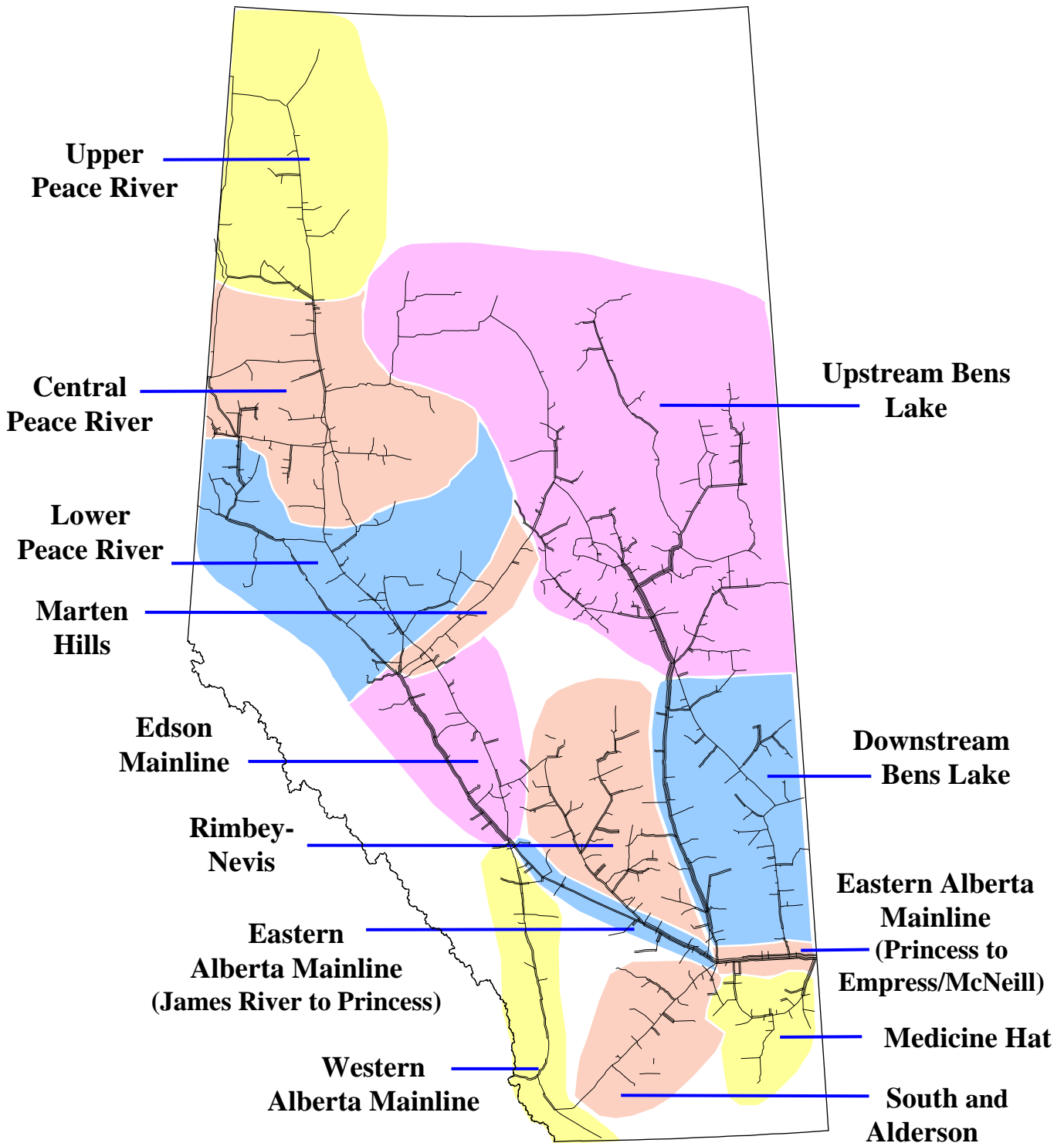
Service availability is affected by a number of factors including scheduled and unscheduled maintenance, construction or other outages.

As a monthly feature the Historical Transportation Service Availability is shown as a three-month rolling average of transportation availability.

## **Future Firm Transportation Service Availability**

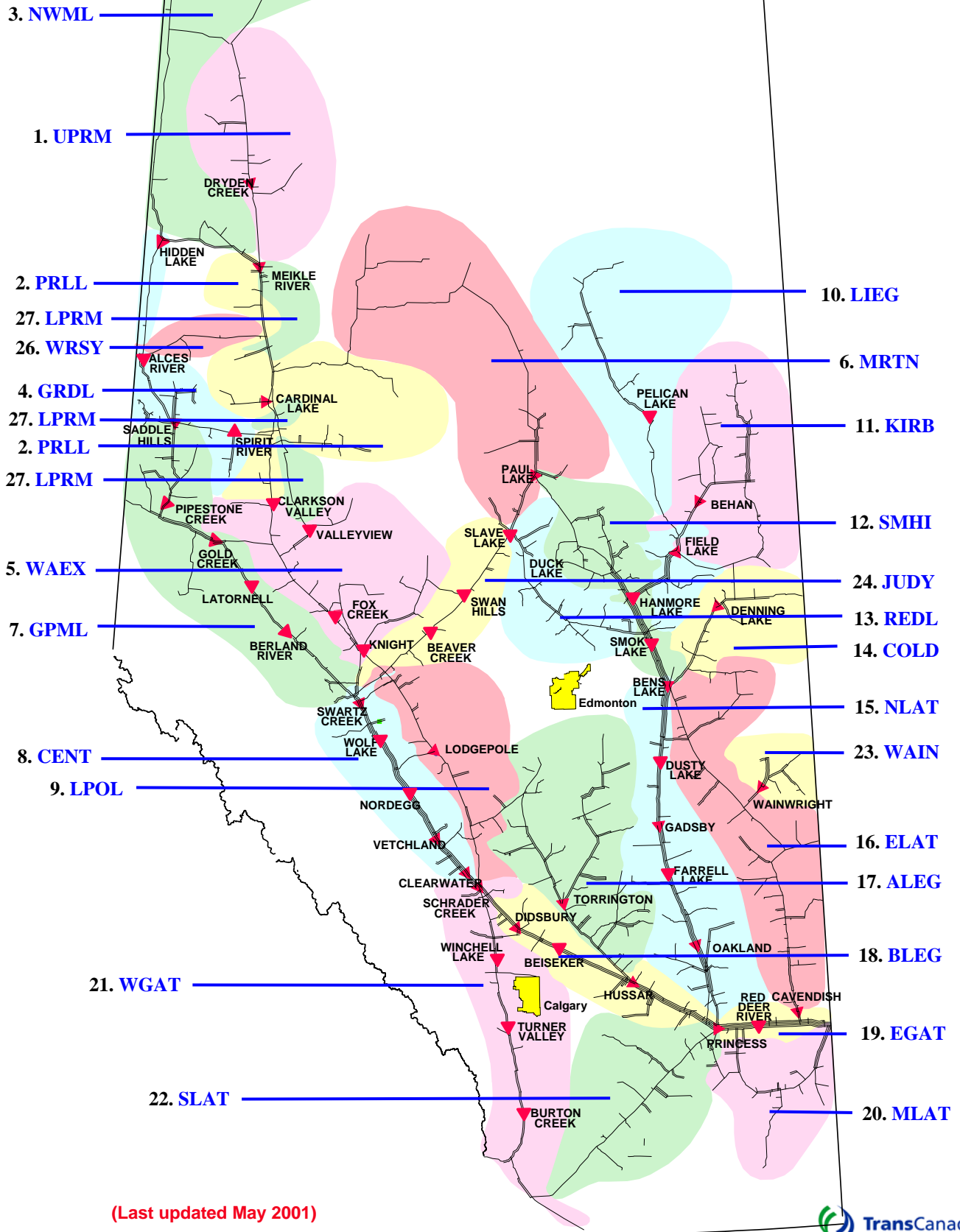
The Future Firm Transportation Service Availability report presents guidelines and timing for all future firm transportation service requests.

# NGTL DESIGN AREAS



(Last updated February 2001)

# NGTL PIPELINE SEGMENTS



(Last updated May 2001)

# DEFINITION OF TERMS

---

## *Design Capacity Utilization*

### ***Actual Flow***

The amount of gas flowing out of an area.

### ***AVGLF (Average Load Factor)***

The ratio between average *Actual Flow* and *Design Flow Requirements*. It is calculated for every design season (summer/winter) as shown on the graphs.

### ***Design Flow Requirements***

The forecast of Firm Requirements that is required to be transported in a pipeline system considering design assumptions.

### ***Design Receipt Flow***

The amount of receipt flow for which the area was designed.

### ***Productive Capability***

The lesser of forecast field deliverability and the forecast of aggregate Receipt Contract Demand under Firm Service Agreements held at each receipt point.

### ***Forecast Receipt Firm Transportation Service Agreements***

The forecast sum of all the receipt firm service contracts within and upstream of an area used in mainline facility design.

### ***Intra-Alberta Deliveries***

The amount of sales gas flowing off the system within an area.

### ***Receipt Flow***

Aggregate of actual receipts within an area and the *Actual Flow* of the upstream area.

---

## *Historical Transportation Service Availability*

### ***Average % CD Restricted***

The average percentage of the entire segment receipt contract demand restricted during periods of restriction.

### ***Firm Service Available***

The percentage of time that all requested firm transportation service requests were transported within a segment.

### ***Firm Service Restriction***

Percentage of time firm service is restricted.

### ***IT-2 Service Available***

The percentage of time that IT-2 service requests were transported.

### ***Max % CD Restricted***

The maximum percentage to which the entire segment contract demand was restricted.

---

## *Other*

### ***System Load Factor***

The volume weighted average of the *Average Load Factor (AVGLF)* of all design areas on the system