



**2021 ANNUAL MSP FLEET MIX AND  
NIGHTTIME OPERATIONS REPORT**  
JANUARY 2022

**COMMUNITY RELATIONS OFFICE**

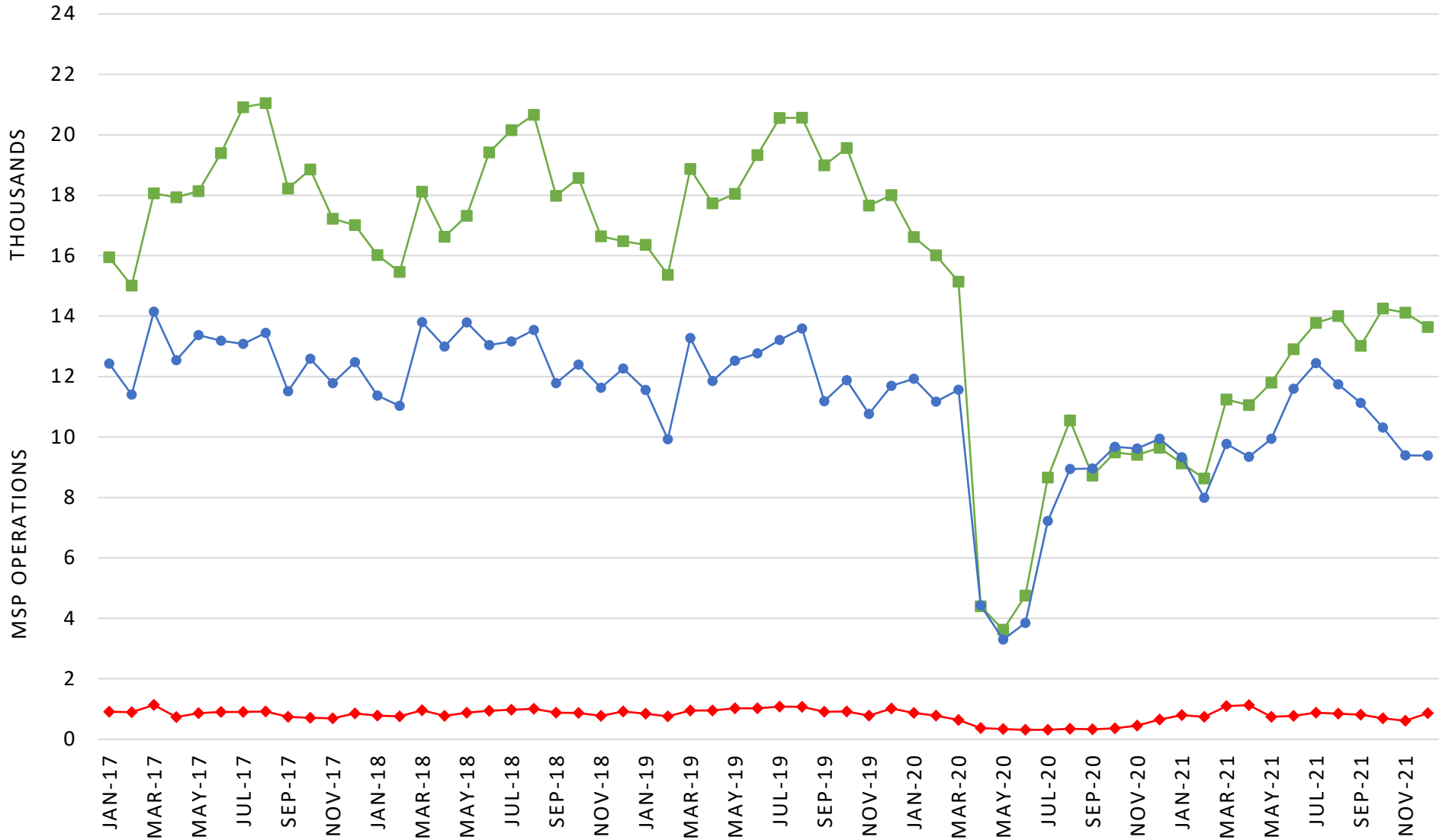
# 2021 ANNUAL MSP FLEET MIX AND NIGHTTIME OPERATIONS REPORT

<b>TABLE OF CONTENTS</b>	
<b>MSP FLEET MIX REPORT</b>	
Monthly Carrier Jet Counts by Type	2
Widebody Jet Activity	3
Narrowbody Jet Activity	4
Regional Jet Activity	5
Average Passengers per Flight	6
MSP Carrier Jet Usage with Cumulative Certificated Noise Levels	7
Average Altitude for Aircraft Arriving to MSP by Category	8
Average Altitude for Aircraft Departing from MSP by Category	9
<b>MSP NIGHTTIME OPERATIONS REPORT</b>	
Average Daily Nighttime Operations	10
Nighttime Operations by Runway	11
Nighttime Operations by Runway Map	12
Nighttime Operations by Airline	13
Nighttime Operations by Aircraft	14
Nighttime Operations by Origin and Destination	15
Nighttime Operations by Hour	16
Scheduled Versus Actual Operations	17

MSP FLEET MIX REPORT

**MONTHLY CARRIER JET COUNTS BY TYPE**

■ NARROWBODY    ◆ WIDEBODY    ● RJ



HUSHKIT BY YEAR: 2017 - 26, 2018 - 32, 2019 - 18, 2020 - 8, 2021 - 68

MSP FLEET MIX REPORT  
**WIDEBODY JET ACTIVITY**



WIDEBODY	TYPE	2017	2018	2019	2020	2021
	A310	0.0%	0.0%	0.0%	0.0%	0.0%
	A330	0.8%	0.7%	0.6%	0.3%	1.0%
	A340	0.1%	0.0%	0.0%	0.0%	0.0%
	A350	0.0%	0.0%	0.0%	0.1%	0.0%
	A380	0.0%	0.0%	0.0%	0.0%	0.0%
	B742	0.0%	0.0%	0.0%	0.0%	0.0%
	B744	0.0%	0.0%	0.0%	0.0%	0.1%
	B748	0.0%	0.0%	0.0%	0.0%	0.1%
	B762	0.1%	0.0%	0.0%	0.0%	0.0%
	B763	0.5%	0.8%	1.1%	1.1%	1.8%
	B764	0.0%	0.0%	0.1%	0.0%	0.2%
	B767	0.0%	0.0%	0.0%	0.0%	0.0%
	B777	0.4%	0.4%	0.5%	0.1%	0.0%
	B7878	0.0%	0.0%	0.1%	0.0%	0.1%
	DC10	0.3%	0.2%	0.0%	0.1%	0.0%
	MD11	0.5%	0.3%	0.2%	0.4%	0.2%
<b>Total</b>	<b>2.7%</b>	<b>2.8%</b>	<b>3.0%</b>	<b>2.6%</b>	<b>3.6%</b>	

MSP FLEET MIX REPORT  
**NARROWBODY JET ACTIVITY**



NARROWBODY	TYPE	2017	2018	2019	2020	2021
	A220	0.0%	0.0%	0.3%	0.9%	2.0%
	A319	6.7%	6.4%	6.7%	7.0%	6.6%
	A20N	0.0%	0.0%	0.0%	0.3%	0.5%
	A320	7.3%	6.9%	8.1%	5.7%	6.0%
	A21N	0.0%	0.0%	0.0%	0.0%	0.0%
	A321	0.5%	2.2%	6.6%	9.6%	10.4%
	B717	5.2%	5.9%	7.8%	2.4%	0.4%
	B72Q	0.0%	0.0%	0.0%	0.0%	0.0%
	B733	0.4%	0.0%	0.0%	0.0%	0.0%
	B734	0.0%	0.0%	0.0%	0.1%	0.1%
	B735	0.0%	0.0%	0.0%	0.0%	0.0%
	B7377	5.0%	4.7%	3.8%	2.6%	2.1%
	B738	9.8%	10.1%	11.3%	10.8%	11.1%
	B739	5.0%	7.5%	8.1%	8.0%	8.7%
	B38M	0.0%	0.1%	0.0%	0.0%	0.3%
	B73Q	0.0%	0.0%	0.0%	0.0%	0.0%
	B757	5.9%	6.1%	5.1%	5.0%	4.6%
	DC9Q	0.0%	0.0%	0.0%	0.0%	0.0%
	MD80	2.5%	0.3%	0.0%	0.0%	0.0%
	MD90	8.8%	6.8%	0.6%	0.0%	0.0%
<b>TOTAL</b>	<b>57.3%</b>	<b>57.0%</b>	<b>58.7%</b>	<b>52.4%</b>	<b>52.7%</b>	

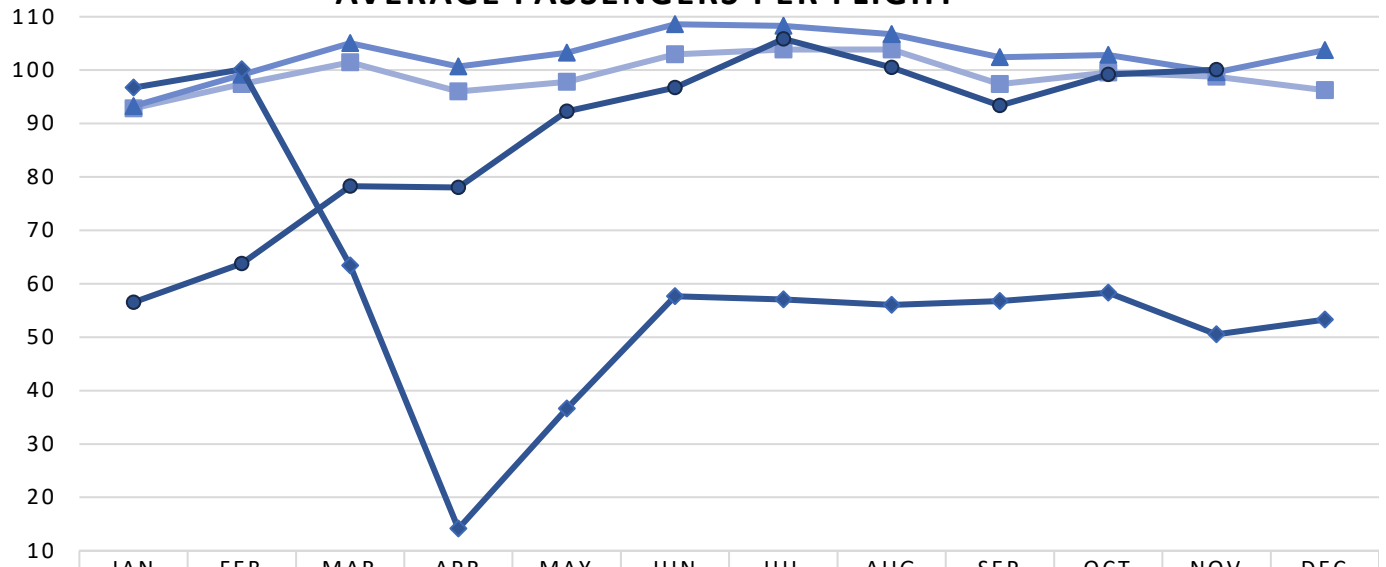
MSP FLEET MIX REPORT  
**REGIONAL JET ACTIVITY**



REGIONAL JET	TYPE	2017	2018	2019	2020	2021
	CRJ	0.0%	0.0%	0.0%	0.0%	0.0%
	CRJ1	0.1%	0.0%	0.0%	0.0%	0.0%
	CRJ2	16.2%	14.3%	12.9%	10.8%	11.9%
	CRJ7	4.8%	7.0%	3.9%	2.9%	2.3%
	CRJ9	11.3%	13.0%	13.8%	20.2%	21.3%
	E135	0.0%	0.0%	0.0%	0.0%	0.0%
	E145	0.1%	0.0%	0.0%	0.4%	0.2%
	E170	7.1%	5.5%	7.3%	10.6%	7.3%
	E190	0.5%	0.3%	0.4%	0.1%	0.3%
	J328	0.0%	0.0%	0.0%	0.0%	0.4%
<b>Total</b>	<b>40.0%</b>	<b>40.2%</b>	<b>38.3%</b>	<b>45.0%</b>	<b>43.7%</b>	

MSP FLEET MIX REPORT

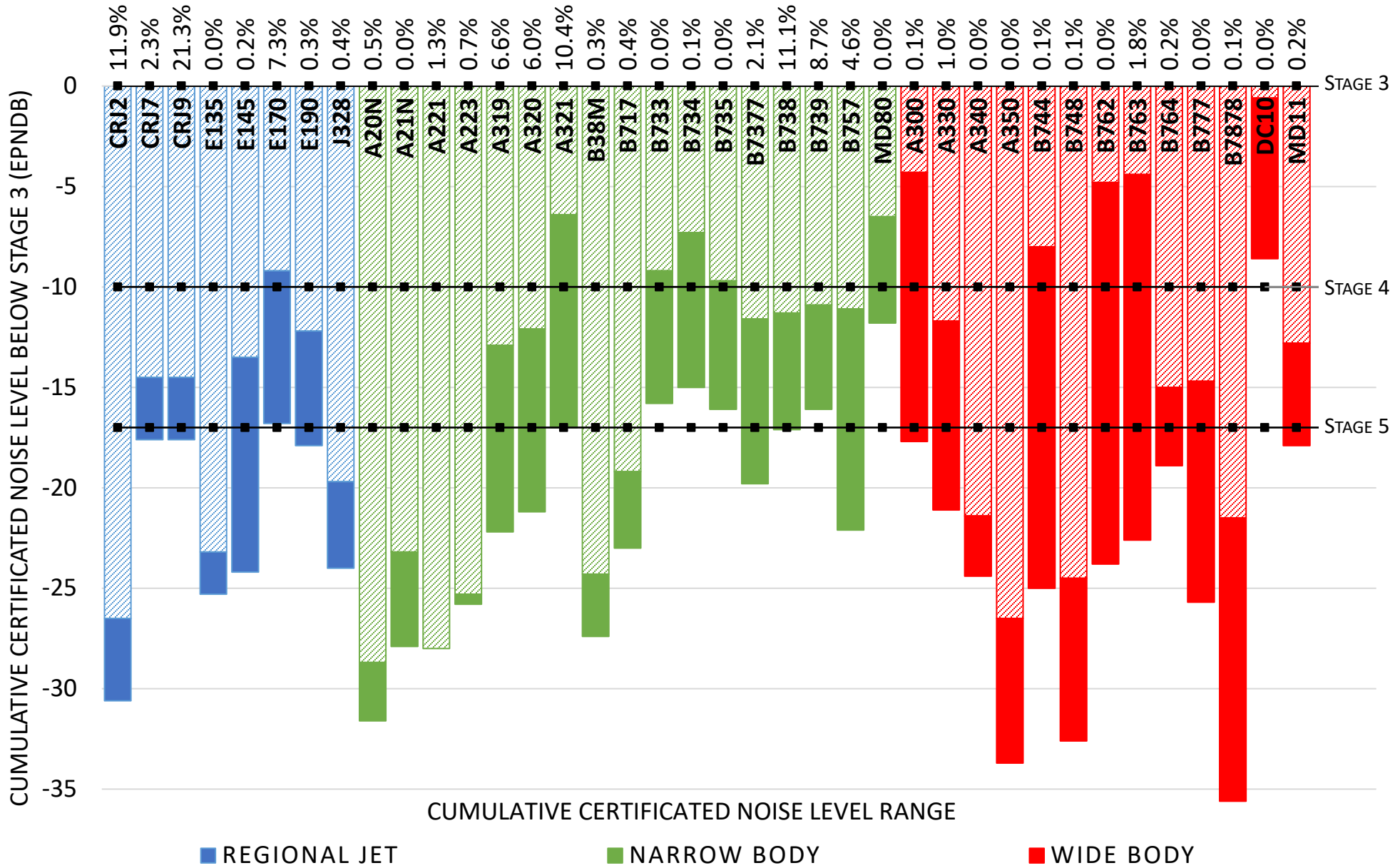
**AVERAGE PASSENGERS PER FLIGHT**



	JAN	FEB	MAR	APR	MAY	JUN	JUL	AUG	SEP	OCT	NOV	DEC
2018	92.8	97.4	101.4	96.0	97.8	103.0	103.8	103.9	97.4	99.6	98.8	96.2
2019	93.3	99.1	105.1	100.7	103.3	108.6	108.3	106.7	102.4	102.8	99.6	103.7
2020	96.7	100.1	63.4	14.1	36.6	57.7	57.1	56.0	56.7	58.3	50.5	53.3
2021	56.5	63.8	78.2	78.0	92.3	96.7	105.8	100.5	93.4	99.2	100.1	

SOURCE: MSP MONTHLY OPERATIONS REPORTS

# 2021 MSP CARRIER JET USAGE WITH CUMULATIVE CERTIFICATED NOISE LEVELS



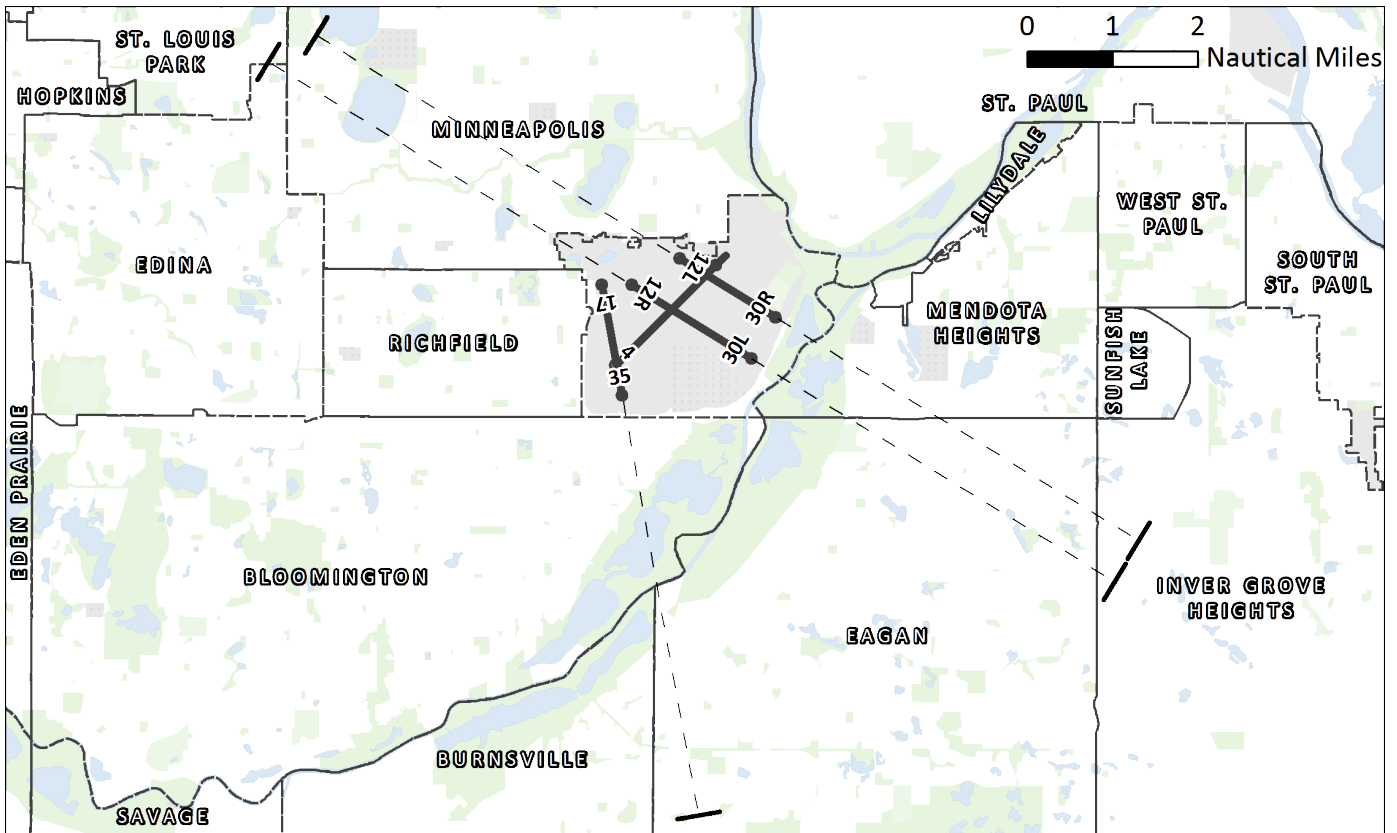
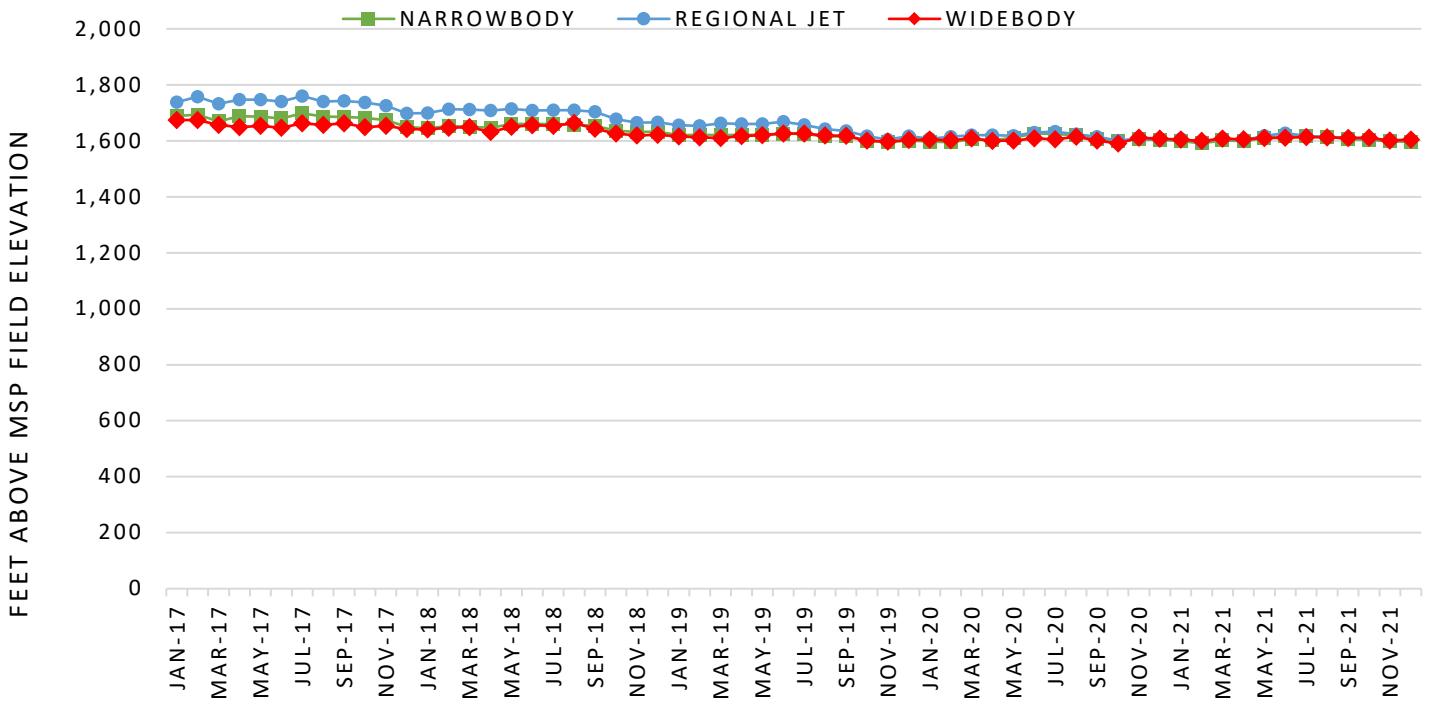
SOURCE: USAGE DATA: MACNOMS; NOISE CERTIFICATION DATA: EUROPEAN AVIATION SAFETY AGENCY

CUMULATIVE CERTIFICATED NOISE LEVELS REPRESENTED AS A RANGE TO ACCOUNT FOR MULTIPLE CERTIFICATION VARIABLES (WEIGHT, MODEL, ENGINE TYPE, AIRFRAME CONFIGURATION, ETC)



MSP FLEET MIX REPORT

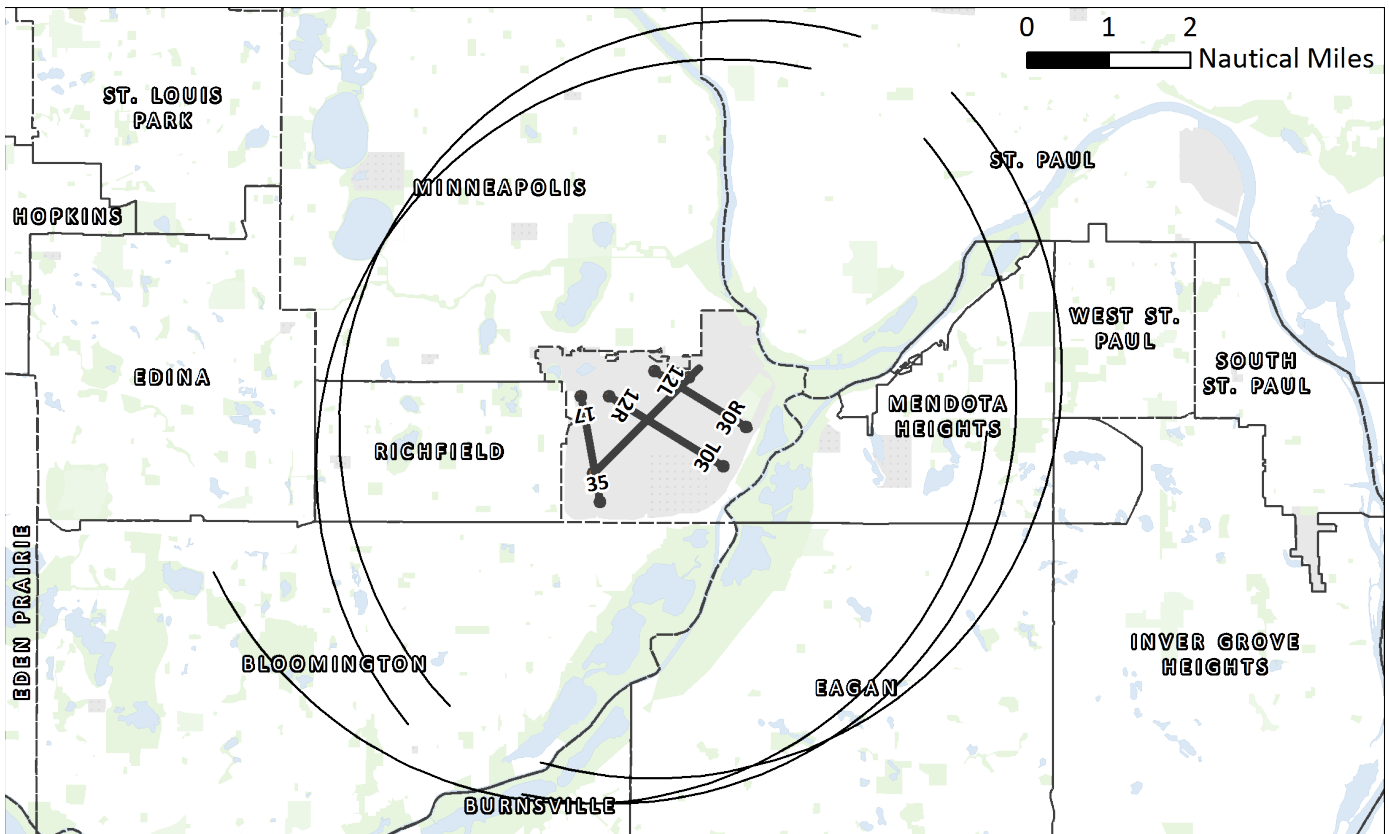
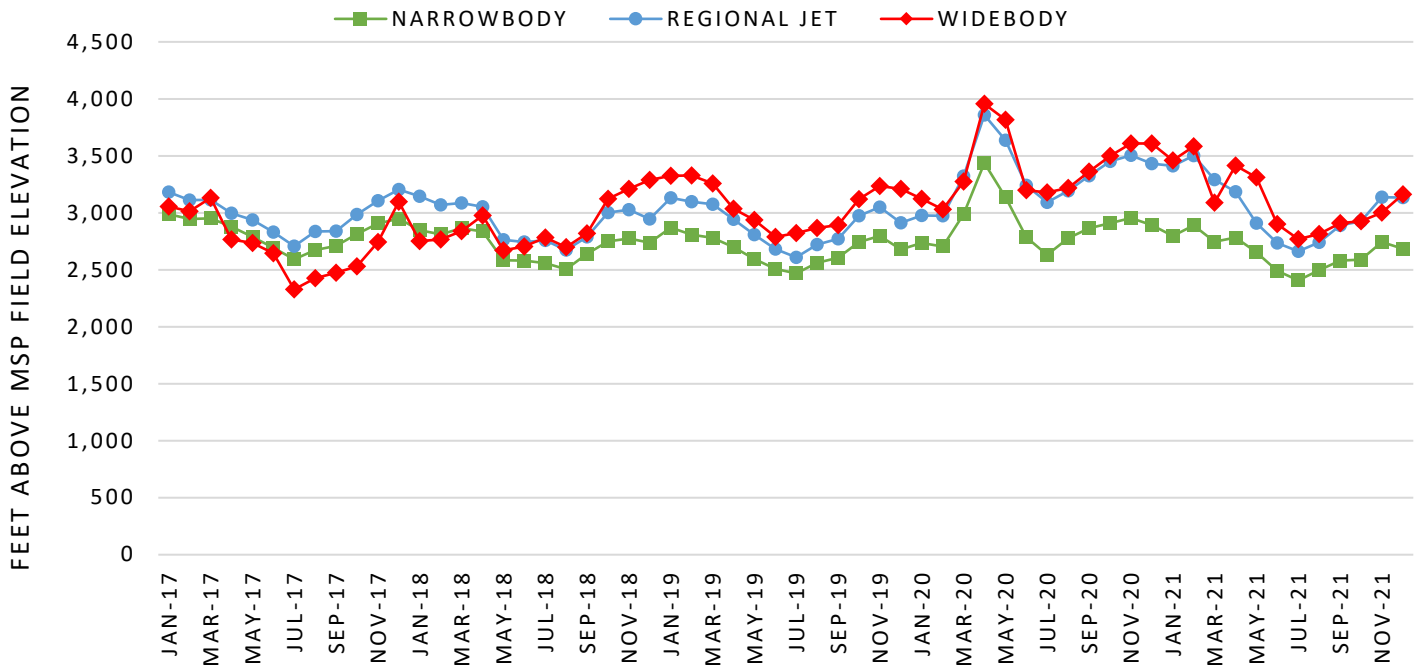
**AVERAGE ALTITUDE FOR AIRCRAFT ARRIVING TO MSP**



MEASUREMENT GATE IS FIVE NAUTICAL MILES FROM THE THRESHOLD OF THE ARRIVAL RUNWAY

MSP FLEET MIX REPORT

**AVERAGE ALTITUDE FOR AIRCRAFT DEPARTING FROM MSP**

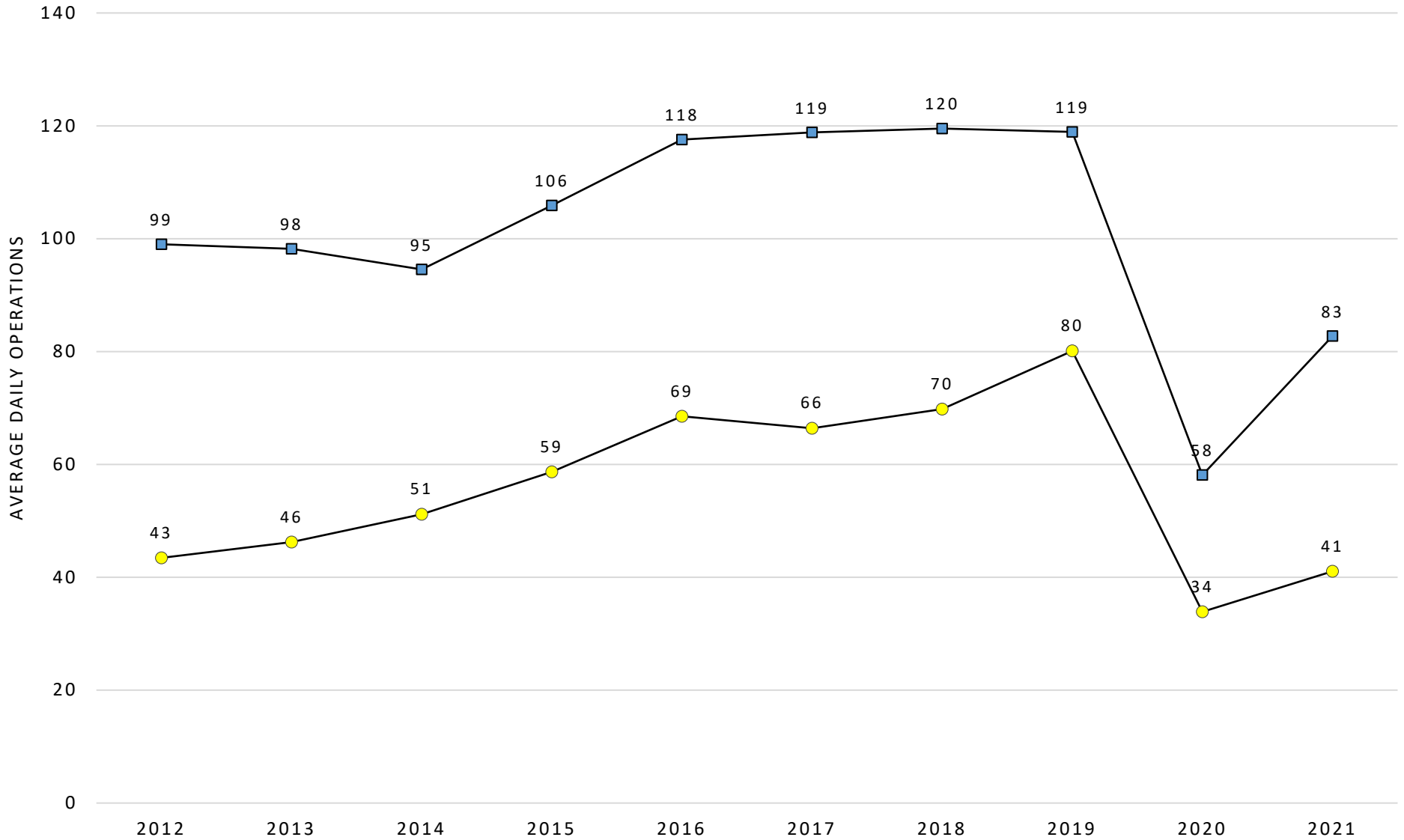


MEASUREMENT GATE IS AN ARC FIVE NAUTICAL MILES FROM THE START OF TAKEOFF ROLL

MSP NIGHTTIME OPERATIONS REPORT

**AVERAGE DAILY NIGHTTIME OPERATIONS**

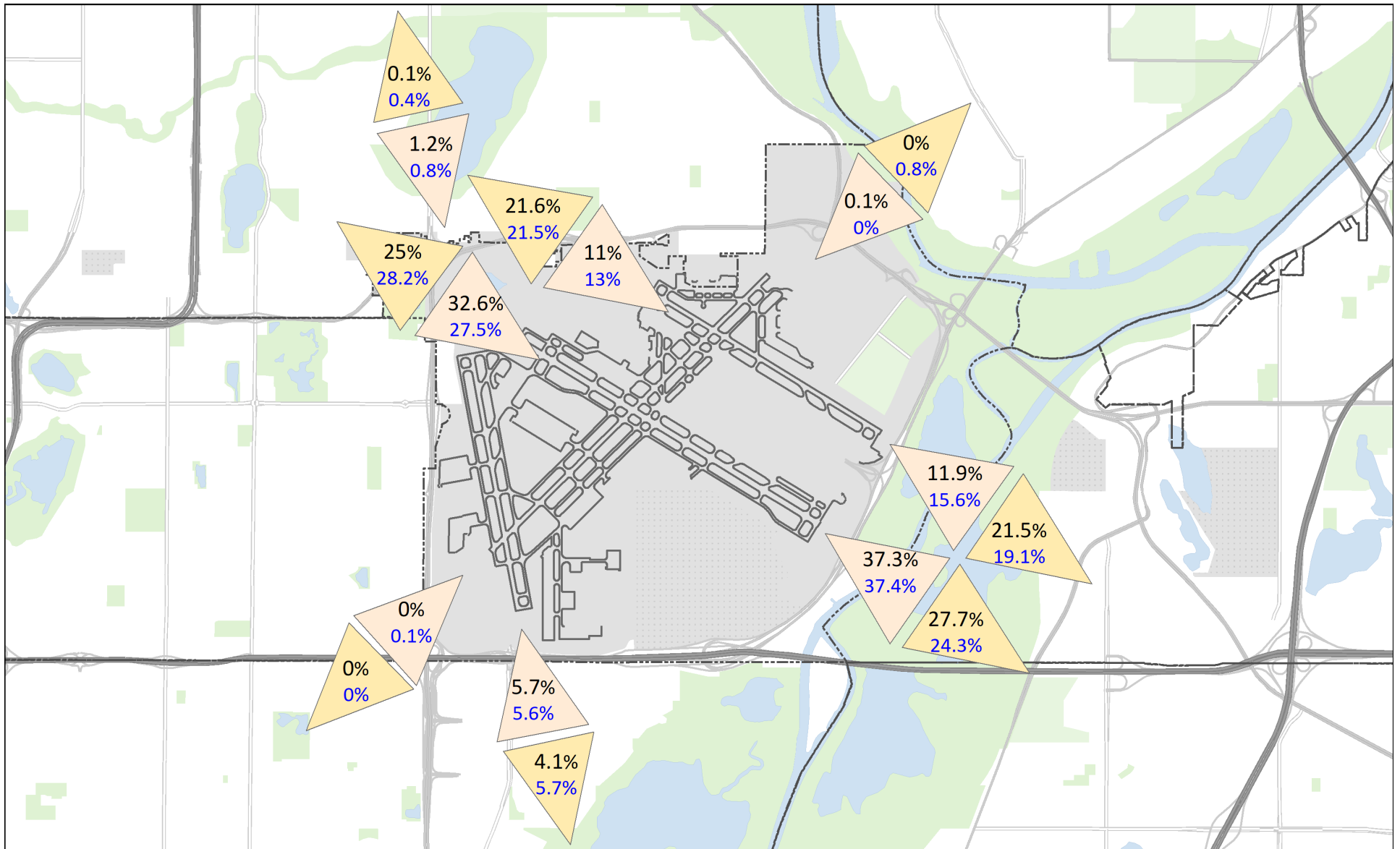
● 10:30 PM - 6:00 AM    ■ 10:00 PM - 7:00 AM



MSP NIGHTTIME OPERATIONS REPORT  
**NIGHTTIME OPERATIONS BY RUNWAY**  
(10:30 PM – 6:00 AM)

RWY	ARR / DEP	OVERFLIGHT AREA	2021			2018 - 2020 AVERAGE		
			TOTAL NIGHT OPS	AVERAGE DAILY NIGHT OPS	%	TOTAL NIGHT OPS	AVERAGE DAILY NIGHT OPS	%
04	ARR	SO. RICHFIELD/BLOOMINGTON	0	0.0	0.0%	23	0.1	0.1%
12L	ARR	SO. MINNEAPOLIS/NO. RICHFIELD	1,174	3.2	11.0%	2,008	5.5	13.0%
12R	ARR	SO. MINNEAPOLIS/NO. RICHFIELD	3,473	9.5	32.6%	4,250	11.6	27.5%
17	ARR	SO. MINNEAPOLIS	133	0.4	1.2%	120	0.3	0.8%
22	ARR	ST. PAUL/HIGHLAND PARK	15	0.0	0.1%	0	0.0	0.0%
30L	ARR	EAGAN/MENDOTA HEIGHTS	3,981	10.9	37.3%	5,776	15.8	37.4%
30R	ARR	EAGAN/MENDOTA HEIGHTS	1,272	3.5	11.9%	2,414	6.6	15.6%
35	ARR	BLOOMINGTON/EAGAN	613	1.7	5.7%	865	2.4	5.6%
<b>TOTAL NIGHTTIME ARRIVALS</b>			<b>10,661</b>	<b>29.2</b>		<b>15,456</b>	<b>42.3</b>	
04	DEP	ST. PAUL/HIGHLAND PARK	2	0.0	0.0%	53	0.1	0.8%
12L	DEP	EAGAN/MENDOTA HEIGHTS	929	2.5	21.5%	1,319	3.6	19.1%
12R	DEP	EAGAN/MENDOTA HEIGHTS	1,199	3.3	27.7%	1,683	4.6	24.3%
17	DEP	BLOOMINGTON/EAGAN	176	0.5	4.1%	391	1.1	5.7%
22	DEP	SO. RICHFIELD/BLOOMINGTON	0	0.0	0.0%	1	0.0	0.0%
30L	DEP	SO. MINNEAPOLIS/NO. RICHFIELD	1,083	3.0	25.0%	1,953	5.3	28.2%
30R	DEP	SO. MINNEAPOLIS/NO. RICHFIELD	935	2.6	21.6%	1,485	4.1	21.5%
35	DEP	SO. MINNEAPOLIS	3	0.0	0.1%	31	0.1	0.4%
<b>TOTAL NIGHTTIME DEPARTURES</b>			<b>4,327</b>	<b>11.9</b>		<b>6,916</b>	<b>18.8</b>	
<b>TOTAL NIGHTTIME OPERATIONS</b>			<b>14,988</b>	<b>41.1</b>		<b>22,372</b>	<b>61.1</b>	

MSP NIGHTTIME OPERATIONS REPORT  
**NIGHTTIME OPERATIONS BY RUNWAY MAP**  
(10:30 PM – 6:00 AM)



MSP NIGHTTIME OPERATIONS REPORT  
**NIGHTTIME OPERATIONS BY AIRLINE**  
 (TOP 15 BY COUNT)

2021	AIRLINE	ID	COUNT	PERCENT OF AIRLINE OPERATIONS OCCURRING AT NIGHT	PERCENT OF CONTRIBUTION TO NIGHTTIME TOTAL
	DELTA	DAL	3,597	3.6%	25.1%
	SUN COUNTRY	SCX	3,214	15.6%	22.4%
	SKYWEST AIRLINES	SKW	1,632	2.3%	11.4%
	UPS	UPS	1,271	33.2%	8.9%
	AMERICAN	AAL	1,219	15.9%	8.5%
	SOUTHWEST	SWA	957	10.3%	6.7%
	FEDEX	FDX	679	19.6%	4.7%
	GULF & CARIBBEAN CARGO	TSU	367	96.8%	2.6%
	ALASKA	ASA	283	21.8%	2.0%
	ENDEAVOR AIR	EDV	281	0.7%	2.0%
	ENVOY AIR	ENY	201	12.6%	1.4%
	UNITED	UAL	194	4.0%	1.4%
	SPIRIT	NKS	179	5.2%	1.2%
	FRONTIER AIRLINES	FFT	129	11.1%	0.9%
MESA AIRLINES	ASH	119	7.0%	0.8%	

2020	AIRLINE	ID	COUNT	PERCENT OF AIRLINE OPERATIONS OCCURRING AT NIGHT	PERCENT OF CONTRIBUTION TO NIGHTTIME TOTAL
	DELTA	DAL	2,688	3.6%	23.0%
	SUN COUNTRY	SCX	2,355	16.0%	20.1%
	UPS	UPS	1,359	38.8%	11.6%
	SKYWEST AIRLINES	SKW	1,203	2.2%	10.3%
	FEDEX	FDX	725	23.8%	6.2%
	SOUTHWEST	SWA	577	6.9%	4.9%
	AMERICAN	AAL	572	8.7%	4.9%
	SPIRIT	NKS	492	14.1%	4.2%
	GULF & CARIBBEAN CARGO	TSU	366	95.8%	3.1%
	REPUBLIC AIRLINES	RPA	355	7.2%	3.0%
	ALASKA	ASA	239	18.0%	2.0%
	ATLAS AIR (USA)	GTI	223	76.6%	1.9%
	FRONTIER AIRLINES	FFT	220	17.8%	1.9%
	UNITED	UAL	191	6.4%	1.6%
ENDEAVOR AIR	EDV	130	0.4%	1.1%	

\*AIRLINE OPERATIONS OCCURRING AT NIGHT REPRESENTS THE PERCENTAGE OF RESPECTIVE AIRLINE SCHEDULE THAT OCCURS AT NIGHT

\*CONTRIBUTION TO TOTAL IS RESPECTIVE AIRLINE CONTRIBUTIONS TO OVERALL MSP NIGHT OPERATIONS

MSP NIGHTTIME OPERATIONS REPORT  
**2021 NIGHTTIME OPERATIONS BY AIRCRAFT**  
 (TOP 15 BY COUNT)

<b>AIRCRAFT CODE</b>	<b>DESCRIPTION</b>	<b>COUNT</b>	<b>NOISE LEVEL CERTIFICATION</b> (EPNdB BELOW STAGE 3)
B738	BOEING 737-800	4,284	11.3 - 17.1
B757	BOEING 757-200	1,841	11.1 - 22.1
A321	AIRBUS INDUSTRIES A321	1,463	6.4 - 17
CRJ9	CANADAIR REGIONAL JET CRJ-900	1,243	14.5 - 17.6
B739	BOEING 737-900	970	10.9 - 16.1
E170	EMBRAER 170	693	9.2 - 16.8
B763	BOEING 767-300	661	4.4 - 22.6
CRJ2	CANADAIR REGIONAL JET CRJ-200	658	26.5 - 30.6
B7377	BOEING 737-700	643	11.6 - 19.8
A319	AIRBUS INDUSTRIES A319	614	12.9 - 22.2
A320	AIRBUS INDUSTRIES A320	483	12.1 - 21.2
A330	AIRBUS INDUSTRIES A330	287	11.7 - 21.1
A300	AIRBUS INDUSTRIES A300	137	4.3 - 17.7
B38M	BOEING 737-8 MAX	97	24.3 - 27.4
MD11	MCDONNELL DOUGLAS MD11	94	12.8 - 17.9

*NOISE CERTIFICATION DATA SOURCE: EUROPEAN AVIATION SAFETY AGENCY*

*CUMULATIVE CERTIFICATED NOISE LEVELS REPRESENTED AS A RANGE BELOW STAGE 3 NOISE LEVELS TO ACCOUNT FOR MULTIPLE CERTIFICATION VARIABLES (WEIGHT, MODEL, ENGINE TYPE, AIRFRAME CONFIGURATION, ETC)*

MSP NIGHTTIME OPERATIONS REPORT  
**2021 NIGHTTIME OPERATIONS BY ORIGIN AND DESTINATION**  
 (TOP 15 BY COUNT)

AIRPORT CODE	ORIGIN AIRPORT	COUNT
PHX	PHOENIX	1,049
LAS	LAS VEGAS	707
SEA	SEATTLE	618
DFW	DALLAS FORT WORTH	606
LAX	LOS ANGELES	471
ATL	ATLANTA	468
MEM	MEMPHIS	419
SDF	LOUISVILLE	388
DEN	DENVER	348
PDX	PORTLAND	339
SFO	SAN FRANCISCO	310
MCO	ORLANDO	303
MIA	MIAMI	283
CLT	CHARLOTTE	268
ORD	CHICAGO O'HARE	240

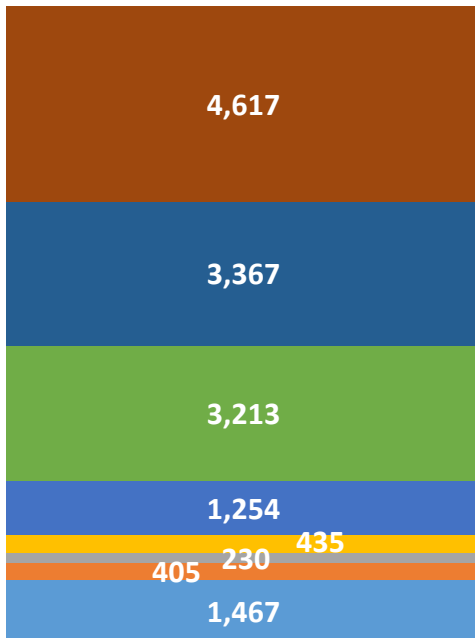
AIRPORT CODE	DESTINATION AIRPORT	COUNT
ATL	ATLANTA	357
FAR	FARGO	220
RAP	RAPID CITY	210
BIS	BISMARCK	201
DLH	DULUTH	199
TVF	THEIF RIVER FALLS REGIONAL	178
DEN	DENVER	177
FSD	SIOUX FALLS	176
GFK	GRAND FORKS	175
RST	ROCHESTER MN	164
LAS	LAS VEGAS	132
MIA	MIAMI	131
ONT	ONTARIO	124
PHX	PHOENIX	118
ORD	CHICAGO O'HARE	109



MSP NIGHTTIME OPERATIONS REPORT  
**NIGHTTIME OPERATIONS BY HOUR**

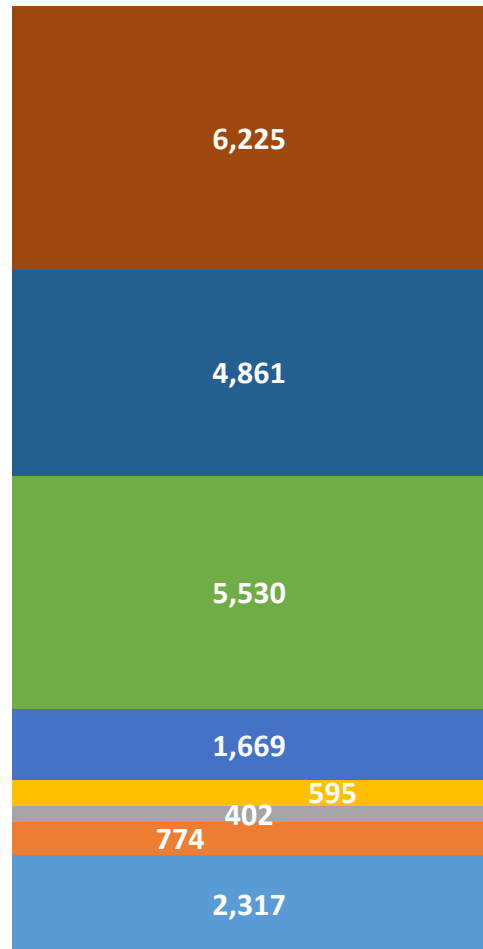
**2021**

- 0:00 ■ 1:00 ■ 2:00 ■ 3:00
- 4:00 ■ 5:00 ■ 22:30 ■ 23:00



**3-YEAR HISTORICAL AVERAGE**

- 0:00 ■ 1:00 ■ 2:00 ■ 3:00
- 4:00 ■ 5:00 ■ 22:30 ■ 23:00



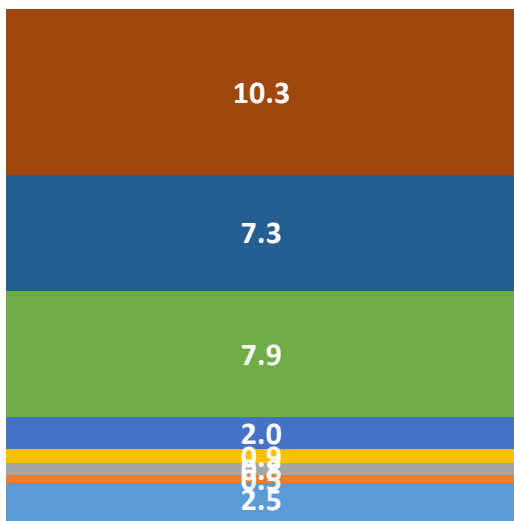
MSP NIGHTTIME OPERATIONS REPORT  
**SCHEDULED VERSUS ACTUAL OPERATIONS**  
 (AVERAGE BY HOUR)

**DAILY SCHEDULED NIGHT OPERATIONS**

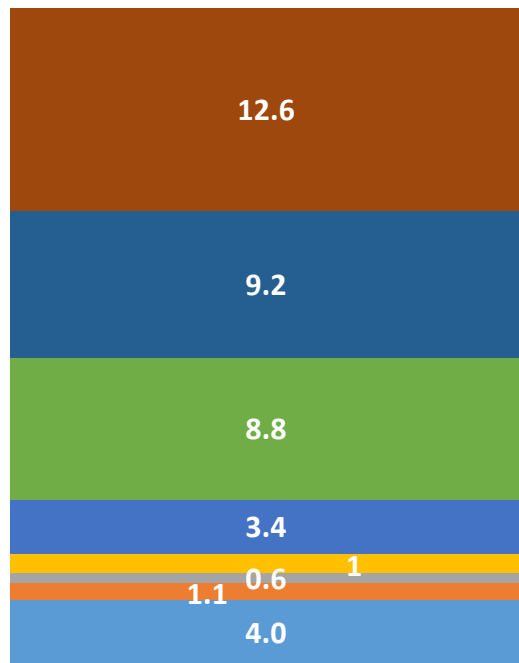
0:00 1:00 2:00 3:00  
 4:00 5:00 22:30 23:00

**DAILY ACTUAL NIGHT OPERATIONS**

0:00 1:00 2:00 3:00  
 4:00 5:00 22:30 23:00



Correction made to scheduled operations 1/5/2023.



GENERAL AVIATION AND CHARTER AIRCRAFT OPERATORS DO NOT REPORT SCHEDULED OPERATIONS



**Metropolitan Airports Commission**

6040 28th Avenue South, Minneapolis, MN 55450

[metroairports.org](http://metroairports.org)

*This report is for informational purposes only.*