APRIL 2018
Update- All things Aviation:

If you'd like additional information, please contact Newport Beach City Manager Dave Kiff at dkiff@newportbeachca.gov.

Summary of recent aviation Activities by the City of Newport Beach

Monitoring the STAYY[1]. The new two-turn departure procedure, which attempts to turn twice in the Upper Newport Bay as the bay itself turns, has been used in a limited way by Southwest Airlines since Thursday, March 29. The City's been monitoring it in the field and using Volans, and has been reviewing any noise impacts. The good news is that it does not appear to add to noise. But it also seems to only have a minimal effect on noise reduction. The tracks themselves seem to show that the STAYY is performing fairly well in terms of splitting the Upper Bay "narrows" more precisely than the PIGGN/HHERO/FINZZ and still going over NMS #7. That in itself is good – it's nice to not see STAYY departures going directly over folks homes along the east and west sides of the Upper Bay (because the PIGGN/HHERO/FINZZ seem to do exactly that sometimes).

Trip to Washington. A number of us City folks (including **Council Members Dixon, Herdman, and Muldoon**) went to Washington DC the week of April 23 on a trip organized by the City's lobbyist (Buchanan, Ingersoll, and Rooney). They met with representatives from the FAA as well as Congress. The intent of this initial trip is to express the general concerns about how NextGen and recent changes in departure procedures have impacted us all. A good goal coming out of the trip would be an

[1] See tracks and noise and altitude data which follow.

increased awareness of our DC representatives of how having planes get "higher earlier" may help reduce noise and pollution impacts here. We don't have the data yet to show exactly how that will work (see comments about HMMH below) but the purpose of this trip is to establish relationships that will make the 2nd trip with the data all the more impactful. That second trip – hopefully with data and recommendations in hand - may be in September 2018.

The City Council in D.C.

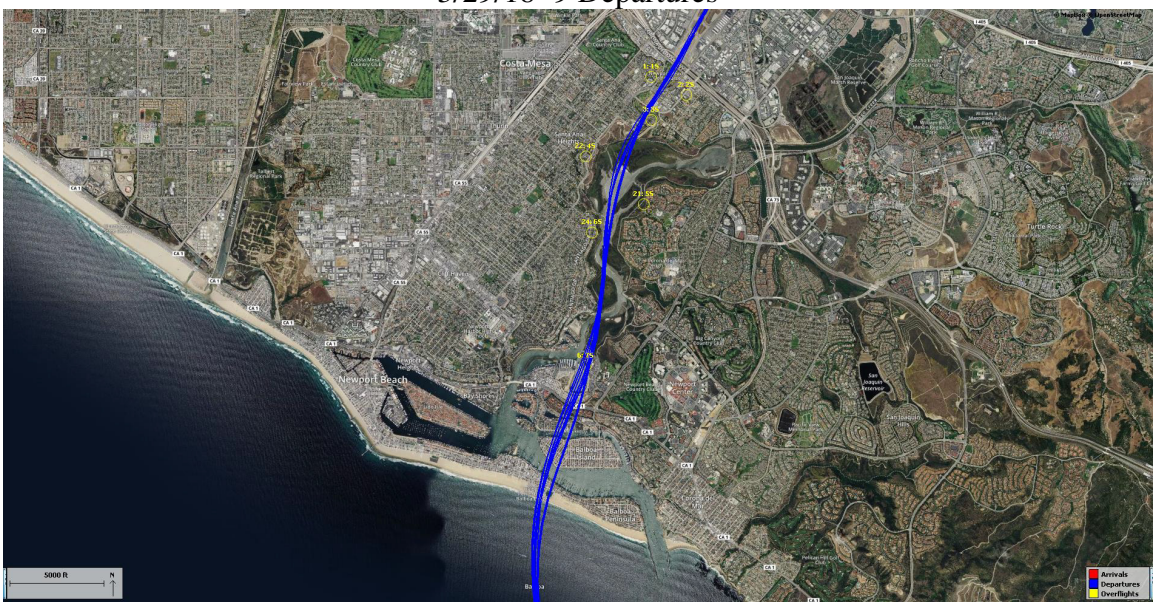
Consultants. In addition to the City's DC lobbyist (Terrence Heubert of **Buchanan, Ingersoll, and Rooney**), the City has a team from Dynamic Strategies (a public relations/communications firm) and HMMH (a technical firm that does noise analyses, among other things) working for the City. **Dynamic** helps develop the right messaging, and guides the City as to ways to communicate best with the air carriers and others. They're also helping organize ways for the citizenry to effectively communicate the best messages. **HMMH** is a technical firm. It is doing a detailed analysis of departure procedures – so that the City can compare carriers, tow weights, and each plane type's optimal departure procedure in terms of noise impacts. HMMH's data and recommendations will be vital to going to the carriers and the FAA is encouraged to adopt quieter (but still safe) procedures. The City expects HMMH to come back with some recommendations within the next six weeks or so.

Helping out our residents. As always, if any resident has a question about a departure or the new STAYY (or the old PIGGN, HHERO, or FINZZ), Tom Edwards and Dave Kiff are here to help. Between the two of them, they can track down

odd flights, show where your home is in relation to those flights; show a series of flights over time, and much more. A good deal of time is spent on this. No question is too minor. Please don't hesitate to contact Dave Kiff (dkiff@newportbeachca.gov) and either Tom or Dave will help out. They may not always tell you what you want to hear (like never hearing or seeing a plane again), but they'll give you all the information at their disposal.

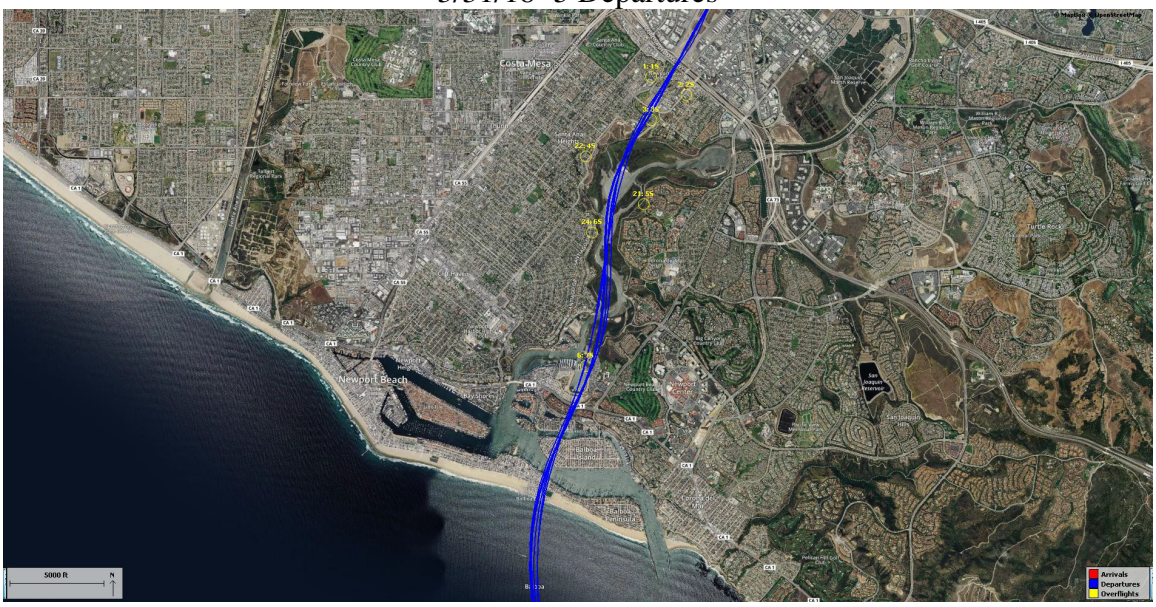
STAYY Departures Tracks 3-29-18 to 4-3-18

3/29/18- 9 Departures

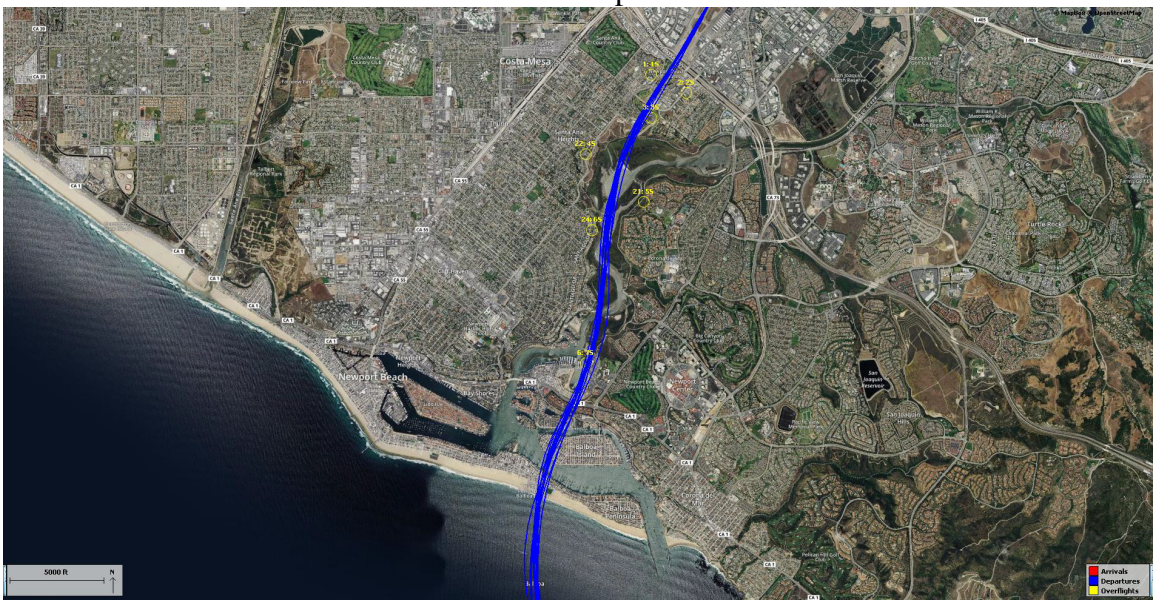


3/30/18- 13 Departures

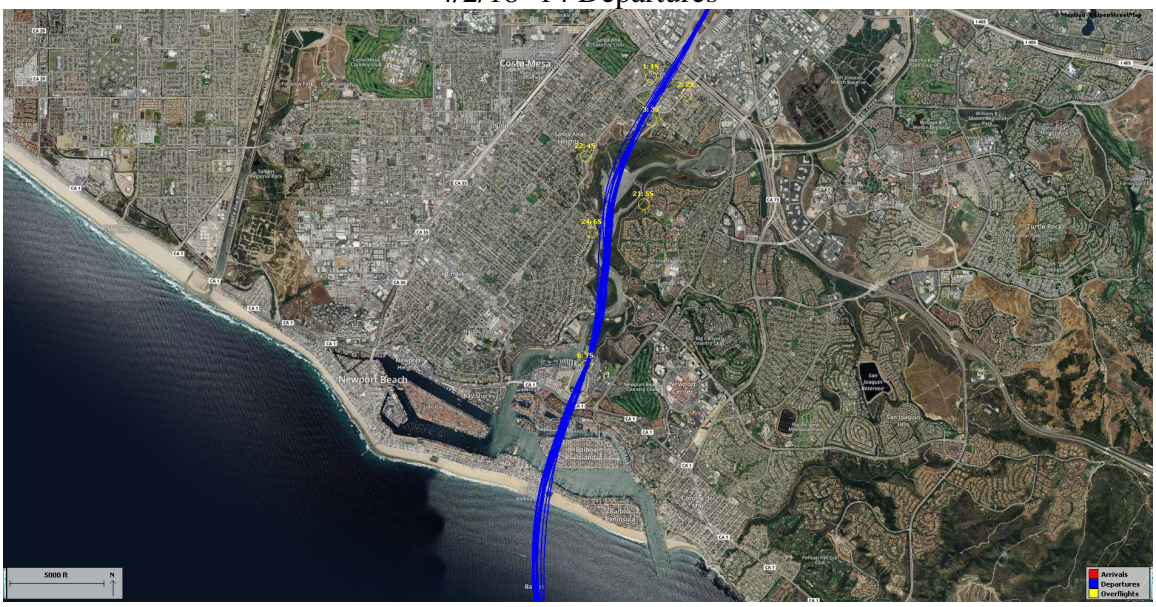
3/31/18- 5 Departures



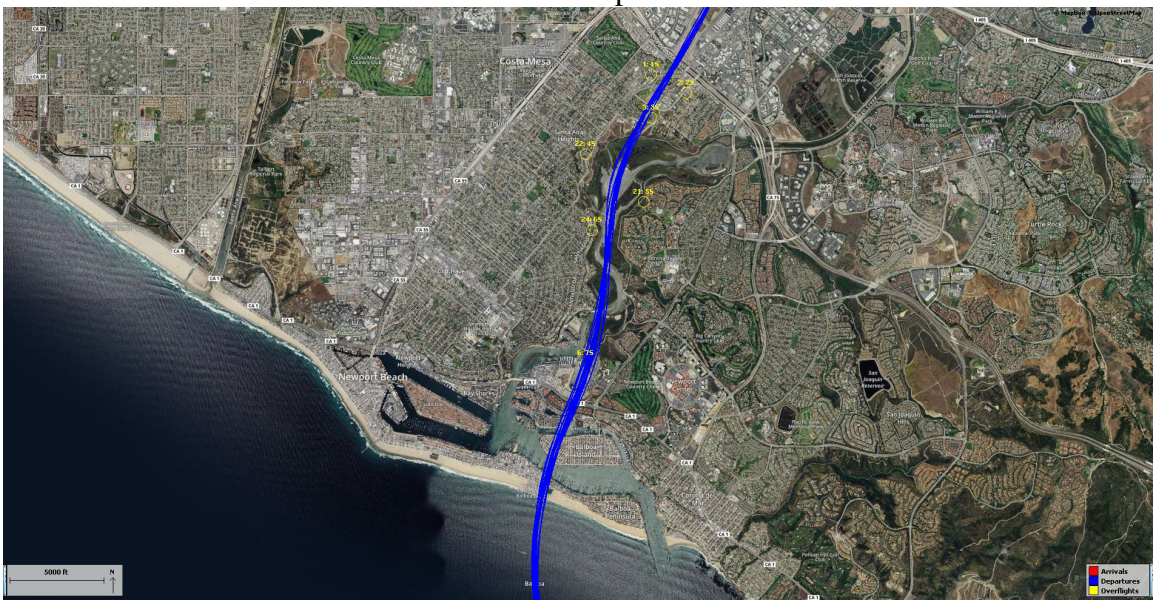
4/1/18- 12 Departures



4/2/18- 14 Departures



4/3/18- 13 Departures



Preliminary Noise Readings from the STAYY

Below you will seem some very preliminary noise readings from the first six (6) days of STAYY departures. The flights analyzed are the flights that appeared to fly the STAYY as close as possible as designed:

	STAYY	PIGGN
Flt #6004	29-Mar	22-Mar
GTOW	133,981	129,500
1S	95.4	92.5
2S	95	91.6
3S	91.8	90.2
4S	85.5	86.7
5S	86.1	85.5
6S	86.4	86.2
7S	82.9	83.9

	STAYY	PIGGN
Flt #1502	30-Mar	23-Mar
GTOW	127,586	129,170
1S	91.7	95.3
2S	N/A	94.3
3S	89.6	94.2
4S	84.1	91.3
5S	85.3	89
6S	N/A	90.3
7S	82	86.1

	STAYY	PIGGN
Flt #2350	31-Mar	24-Mar
GTOW	125,461	123,680
1S	90.9	90.6
2S	91.5	90.5
3S	89.2	89.9
4S	83.8	86.9
5S	82.9	85.6
6S	84.5	85.9
7S	81.4	85.9

	STAYY	PIGGN
Flit #3749	1-Apr	25-Mar
GTOW	123,726	117,709
1S	92.7	90.2
2S	92.4	90.2
3S	90	88.8
4S	85.2	85.7
5S	85.4	84.6
6S	85.6	84.9
7S	83.3	84.6

	STAYY	PIGGN
Flt #5580	2-Apr	26-Mar
GTOW	110,779	112,703
1S	88.8	88.6
2S	89.7	88.8
3S	87.2	87.7
4S	83.8	82.4
5S	83.8	83.8
6S	82.9	83.9
7S	83.8	82.8

	STAYY	PIGGN
Flt #2118	3-Apr	27-Mar
GTOW	121,500	122,100
1S	92.1	91.8
2S	92.4	91.4
3S	89.5	89.8
4S	84.4	84.2
5S	85.3	84.2
6S	84.9	85.4
7S	83.8	81.8

A further Comparison of the above with Altitude Readings

STAYY Flt# 6004 on 3/29/18

GTOW	Destination	NMS	Altitude Date/Time	Altitude at NMS (ft)	SENEL dB
133981	KDEN	1S	3/29/2018 20:28:25	879	95.4
		2S	3/29/2018 20:28:25	860	95.0
		3S	3/29/2018 20:28:33	1119	91.8
		4S	3/29/2018 20:28:44	1365	85.5
		5S	3/29/2018 20:28:50	1539	86.1
		6S	3/29/2018 20:28:58	1719	86.4
		7S	3/29/2018 20:29:24	2457	82.9

PIGGN Flt# 6004 on 3/22/18

GTOW	Destination	NMS	Altitude Date/Time	Altitude at NMS (ft)	SENEL dB
129500	KDEN	1S	3/22/2018 21:38:00	991	92.5
		2S	3/22/2018 21:37:59	919	91.6
		3S	3/22/2018 21:38:08	1371	90.2
		4S	3/22/2018 21:38:22	1696	86.7
		5S	3/22/2018 21:38:29	1844	85.5
		6S	3/22/2018 21:38:38	2005	86.2
		7S	3/22/2018 21:39:07	2838	83.9

STAYY Flt#2118 on 4/3/18

GTOW	Destination	NMS	Altitude Date/Time	Altitude at NMS (ft)	SENEL dB
121500	KPHX	1S	4/3/2018 8:21:46	951	92.1
		2S	4/3/2018 8:21:46	932	92.4
		3S	4/3/2018 8:21:54	1329	89.5
		4S	4/3/2018 8:22:07	1677	84.4
		5S	4/3/2018 8:22:13	1818	85.3
		6S	4/3/2018 8:22:22	1962	84.9
		7S	4/3/2018 8:22:50	2726	83.8

PIGGN Flt# 2118 on 3/27/18

GTOW	Destination	NMS	Altitude Date/Time	Altitude at NMS (ft)	SENEL dB
122100	KPHX	1S	3/27/2018 8:17:41	899	91.8
		2S	3/27/2018 8:17:41	879	91.4
		3S	3/27/2018 8:17:49	1115	89.8
		4S	3/27/2018 8:18:00	1289	84.2
		5S	3/27/2018 8:18:05	1404	84.2
		6S	3/27/2018 8:18:13	1545	85.4
		7S	3/27/2018 8:18:38	2198	81.8

The above flights with the additional information were chosen at random. The City has received a larger set of technical data, whose results will be further analyzed. In addition with regards to all of the data this is a very small sample size of data. Until a larger data set is available, it will be difficult to determine the full results. In addition the manner by which the carrier departs is extremely important (see the discussion which follows).

Departure Procedures

Many of you have asked about the departure procedures at JWA and what procedure the particular carriers are using, i.e., the NADP1 or 2. Initially, only two carriers have changed procedures within the past six months; Horizon E175 and UPS A306.Here is the latest information on the following pages:

John Wayne Airport Departure Procedures				
Air Carrier		*NADP1 - Close In*	*NADP2 - Distant*	*Standard*
Alaska				
	B734/737/738		✓	
American				
	A319/320/321		✓	
	B738		✓	
	B752		✓	
Compass				
	E175	✓		
Delta				
	A319/320	✓		
	B712	✓		
	B737/738	✓		
	B752	✓		
FedEx				
	A306	✓		
Frontier				
	A319/320/32N/321	✓		
Horizon				
	DH8 (Q400)		✓	
	E175	✓		
SkyWest				
	CRJ7/9	✓		
	E175	✓		
Southwest				
	B737/738	✓		
United				
	A319/320		✓	
	B737/738		✓	

UPS		NADP1-Close In	NADP2- Distant	Standard
	A306		✓	
	B752		✓	
WestJet				
	B736/737		✓	

Remember that the manner in which the particular carrier departs the airport is dependent upon the carrier and their ability to not exceed the appropriate noise thresholds at the departure monitors. There are many different factors which dictate how and where planes depart and therefore how much noise they may create. It is not a simple equation but here are the different factors which affect noise: 1. The procedure that the plane flies, which is dictated by the FAA. 2. The take off weight of the aircraft, i.e. the weight of aircraft upon departure. This is subject to the type of aircraft as well as the load of the aircraft, this is determined by the airline; 3. Aircraft performance is another factor pertaining to noise. The climb rate and flight profile of departing aircraft will vary considerably based on aircraft type, this is again determined by the airline; 4. The noise abatement departure profile that the airline chooses, as an example the so called "close in" or "distant" departure procedure. Again this is the choice of the airline. It can not be emphasized enough that all planes departing JWA need only meet the appropriate noise thresholds at the noise monitors; 5. Aircraft noise is also dependent on meteorological conditions including temperature, humidity, and wind. During warm temperatures, the air density (air molecules per cubic foot) decreases significantly, thereby reducing aircraft performance and lift. One report suggests that on an 80° day at JWA an aircraft could have close to a 25% increase in takeoff roll, and up to a 20% decrease in climb performance due to a higher density altitude. Therefore the aircraft can be at lower altitudes over various areas of the departure tracks than on a cooler day. However, aircraft noise is also more noticeable on cloudy days. Low ceiling cloud cover tends to refract aircraft noise downward off the clouds, thus confining it[2].

[2] As noted previously, HMMH is looking at departures from JWA and taking into account some of the above in determining so called optimal departure profiles.

JWA- Passenger Statistics

Airline passenger traffic at John Wayne Airport increased in March 2018 as compared with March 2017. In March 2018, the Airport served 898,418 passengers, an increase of 5.0% when compared with the March 2017 passenger traffic count of 856,025. Commercial aircraft operations increased 3.3% and commuter aircraft operations decreased 19.4% when compared with March 2017 levels.

The Average Daily Departures (ADDs) for March 2018 were 123.60 ADDs vs. 119.87 ADDs for March of 2017. [3]

Long Beach-February 2018

In the month of February 2018, Long Beach Airport saw an increase of +11% in passenger traffic as compared to 2017. The airport served 306,233 passengers for February of 2018. Year to date the airport is +9% over the same period last year.

Ontario

Ontario Airport continues to post robust gains in 2018 as March 2018 was +9.31% over March 2017 and is +9.99% for year to date versus 2017.

The competition for Southern California air travelers is heating up, with JetBlue Airways trying to draw new passengers by returning to Ontario International Airport after a 10-year absence and increasing its flights out of Burbank and Palm Springs. The foregoing if it takes place will further boost service to ONT.

LAX

LAX passenger figures for February 2018 reached a new level while showing an increase of +7.83% for the month over 2017. Already for the first two months of 2018, LAX shows an increase of +5.66% in passengers vs. the same two months in 2017.

[3] One item that is being monitored is that it appears that as the number of commuter operations decreases the number of commercial operations increases and to determine to what extent there is a direct correlation.

Questions about the Airport or Operations

This is a friendly reminder that if you have any questions about John Wayne Airport and its departures and/or operations do not hesitate to contact the City. In addition, the City is willing to go to various locations in the City to observe airport operations. Regarding any questions, the City will try and get you an answer or response as quickly as possible. If you wish to lodge a complaint about noise with the FAA, the City's link on its website is:
http://www.newportbeachca.gov/trending/nextgen-departure-concerns