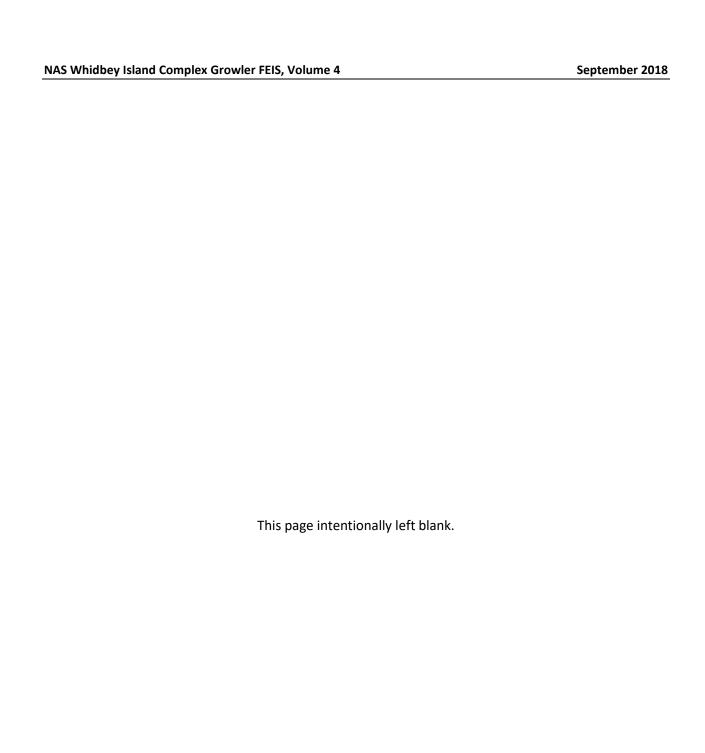
## Appendix F Environmental Justice Data, High-tempo FCLP Year



Appendix F provides tables with detailed data used as part of the environmental justice analysis for the high-tempo Field Carrier Landing Practice (FCLP) year. These tables mirror the tables provided in Section 4.11 that provide data for the average year. Table F-1 shows the minority and low-income populations in the census block groups affected by the Day-Night Average Sound Level (DNL) contours under the high-tempo FCLP year. Table F-2 shows the environmental justice communities affected by the DNL contours under the high-tempo FCLP year for the No Action Alternative. Tables F-3 through F-17 present estimates of the affected minority and low-income populations under each alternative and scenario and compare these estimates to the No Action Alternative.

Table F-1 Minority and Low-Income Populations in Census Block Groups Underlying Ault Field and OLF Coupevile DNL Contours<sup>1</sup> for All Alternatives and Scenarios, High-Tempo FCLP Year

Census Block Group	Total Population2	Percent Population Total Minority3	Percent Population below Poverty Level4
Island County – Community of Comparison	78,506	16.9%	8.0%
Block Group 1, Census Tract 9701	1,102	18.7%	14.1%
Block Group 2, Census Tract 9701	1,502	13.6%	14.1%
Block Group 1, Census Tract 9702	1,633	35.2% <sup>5</sup>	23.4%
Block Group 1, Census Tract 9703	791	24.3%	4.4%
Block Group 2, Census Tract 9703	1,203	15.7%	4.4%
Block Group 3, Census Tract 9703	1,044	13.5%	4.4%
Block Group 4, Census Tract 9703	1,951	11.6%	4.4%
Block Group 1, Census Tract 9704	951	39.3%	8.6%
Block Group 2, Census Tract 9704	2,256	31.9%	8.6%
Block Group 1, Census Tract 9706.01	1,299	41.3%	11.2%
Block Group 2, Census Tract 9706.01	981	30.8%	11.2%
Block Group 1, Census Tract 9707	23.5%	28.2%	20.1%
Block Group 1, Census Tract 9708	1,484	25.9%	8.7%
Block Group 1, Census Tract 9710	1,470	12.7%	6.3%
Block Group 1, Census Tract 9711	2,019	14.7%	2.9%
Block Group 2, Census Tract 9711	1,270	7.5%	2.9%
Block Group 3, Census Tract 9713	1,762	5.9%	6.8%
Skagit County – Community of Comparison	116,901	23.3%	11.7%
Block Group 1, Census Tract 9403	1,174	7.4%	6.2%
Block Group 1, Census Tract 9408	2,278	31.7%	18.2%
Block Group 2, Census Tract 9521	658	13.2%	9.1%
Block Group 3, Census Tract 9527	906	12.9%	7.3%

# Table F-1 Minority and Low-Income Populations in Census Block Groups Underlying Ault Field and OLF Coupevile DNL Contours<sup>1</sup> for All Alternatives and Scenarios, High-Tempo FCLP Year

		Percent	Percent
		Population	Population
	Total	Total	below Poverty
Census Block Group	Population2	Minority3	Level4

Sources: USCB 2012c; 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- Total population for each affected census block group is the total 2010 population for the entire census block group as reported by the U.S. Census Bureau. These figures may be greater than the total number of residents affected by the DNL contours because in many instances only a portion of the census block group falls under the DNL contours.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{(V_1 + V_2)}$ X 100

Table F-2 Environmental Justice Populations at the NAS Whidbey Island Complex under the No Action Alternative, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population²	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Comparis	on (Island Count	y)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9% <sup>5</sup>	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected Population <sup>6</sup>	11,804	2,674	22.7%	929	7.9%

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis.

  Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{(V_1 + V_2)}X$  100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-3 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario A, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
<b>Community of Compariso</b>	on (Island County	·)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 1A					
65-70 DNL	4,303	1,096	25.5% <sup>5</sup>	350	8.1%
70-75 DNL	2,844	608	21.4%	195	6.9%
75+ DNL	5,602	924	16.5%	393	7.0%
Total Affected	12,749	2,628	20.6%	938	7.4%
Population					
Population Change from	No Action Altern	ative			
65-70 DNL	75	45	-	24	-
70-75 DNL	-619	-247	-	-57	-
75+ DNL	1,489	156	-	42	-
Total Population Change from No Action	945	-46	0.0%7	9	1.0%
Alternative <sup>6</sup>					

Table F-3 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario A, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB, 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{(V_1 + V_2)} X$  100.
- <sup>6</sup> Due to rounding, some totals may not sum.
- <sup>7</sup> The absolute number of minority residents declined compared to the number under the No Action Alternative.

Table F-4 Environmental Justice Populations at the NAS Whibdey Island Complex under Alternative 1, Scenario B, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	Total Minority	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population <sup>4</sup>	Income
Community of Compar	<u> </u>	<u> </u>	16.9%		8.0%
No Action Alternative	·	•	•		
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 1B					
65-70 DNL	4,159	1,084	26.1% <sup>5</sup>	345	8.3%
70-75 DNL	3,587	830	23.1%	248	6.9%
75+ DNL	5,420	934	17.2%	402	7.4%
Total Affected	13,166	2,848	21.6%	995	7.6%
Population					
Population Change from	m No Action Alter	native			
65-70 DNL	-69	33	-	19	-
70-75 DNL	124	-25	-	-4	-
75+ DNL	1,307	166	-	51	-
<b>Total Population</b>	1,362	174	12.8%	66	4.8%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-4 Environmental Justice Populations at the NAS Whibdey Island Complex under Alternative 1, Scenario B, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population <sup>4</sup>	Income

Sources: USCB, 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}$ X 100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-5 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario C, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Comparis	on (Island Count	v)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 1C					
65-70 DNL	4,893	1,222	25.0% <sup>5</sup>	376	7.7%
70-75 DNL	3,604	845	23.4%	249	6.9%
75+ DNL	4,764	887	18.6%	399	8.4%
Total Affected	13,261	2,954	22.3%	1,024	7.7%
Population					
Population Change fron	No Action Alteri	native			
65-70 DNL	665	171	-	50	-
70-75 DNL	141	-10	-	-3	-
75+ DNL	651	119	-	48	-
Total Population	1,457	280	19.2%	95	6.5%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-5 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario C, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}$ X 100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-6 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario D, High-Tempo FCLP Year

	Total	Takal Adia asitu	D	Total Low-	0
DNL Contours <sup>1</sup>	Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Income Population <sup>4</sup>	Percent Low Income
Community of Compar	<u> </u>	<u> </u>	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 1D					
65-70 DNL	4,291	1,111	25.9% <sup>5</sup>	354	8.2%
70-75 DNL	3,171	715	22.5%	221	7.0%
75+ DNL	5,660	946	16.7%	403	7.1%
Total Affected	13,122	2,772	21.1%	978	7.5%
Population					
<b>Population Change fro</b>	m No Action Alter	rnative			
65-70 DNL	63	60	-	28	-
70-75 DNL	-292	-140	-	-31	-
75+ DNL	1,547	178	-	52	-
<b>Total Population</b>	1,318	98	7.4%	49	3.7%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-6 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario D, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}$ X 100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-7 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario E, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Compar	ison (Island Coun	ty)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 1E					
65-70 DNL	4,640	1,174	25.3% <sup>5</sup>	364	7.8%
70-75 DNL	3,593	837	23.3%	248	6.9%
75+ DNL	5,029	909	18.1%	403	8.0%
Total Affected	13,262	2,920	22.0%	1,015	7.7%
Population					
Population Change fro	m No Action Alter	rnative			
65-70 DNL	412	123	-	38	-
70-75 DNL	130	-18	-	-4	-
75+ DNL	916	141	-	52	-
Total Population	1,458	246	16.9%	86	5.9%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-7 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 1, Scenario E, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}X$  100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-8 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario A, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population <sup>4</sup>	Percent Low Income
Community of Comparis		<u>-</u>	16.9%	Population	8.0%
No Action Alternative	•	,,		_	
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 2A					
65-70 DNL	4,300	1,098	25.5% <sup>5</sup>	351	8.2%
70-75 DNL	2,879	600	20.8%	193	6.7%
75+ DNL	5,454	904	16.6%	386	7.1%
Total Affected	12,633	2,602	20.6%	930	7.4%
Population					
Population Change from	No Action Alter	native			
65-70 DNL	72	47	-	25	-
70-75 DNL	-584	-255	-	-59	-
75+ DNL	1,341	136	-	35	-
Total Population	829	-72	0.0%7	1	0.1%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-8 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario A, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- <sup>4</sup> The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those within Island County as a whole or that contain percentages of low-income populations that are greater than (or equal to) those within Island County. These shaded cells indicate where environmental justice communities have been identified based on the indicated thresholds. The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}$ X 100
- Due to rounding, some totals may not sum.
- <sup>7</sup> The absolute number of minority residents declined compared to the No Action Alternative.

Table F-9 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario B, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population²	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Compar	ison (Island Coun	ity)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 2B					
65-70 DNL	4,222	1,088	25.8% <sup>5</sup>	345	8.2%
70-75 DNL	3,551	822	23.1%	246	6.9%
75+ DNL	5,310	921	17.3%	398	7.5%
Total Affected	13,083	2,831	21.6%	989	7.6%
Population					
Population Change from	m No Action Alte	rnative			
65-70 DNL	-6	37	-	19	-
70-75 DNL	88	-33	-	-6	-
75+ DNL	1,197	153	-	47	-
Total Population	1,279	157	12.3%	60	4.7%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-9 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario B, High-Tempo FCLP Year

	Total	Total			
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{|V_1+V_2|}$ X 100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-10 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario C, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population <sup>4</sup>	Percent Low Income
Community of Compo	ırison (Island Cou	inty)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 2C					
65-70 DNL	4,793	1,183	24.7% <sup>5</sup>	366	7.6%
70-75 DNL	3,559	829	23.3%	246	6.9%
75+ DNL	4,698	866	18.4%	391	8.3%
Total Affected	13,050	2,878	22.1%	1,003	7.7%
Population					
Population Change fr	om No Action Alt	ternative			
65-70 DNL	565	132	-	40	-
70-75 DNL	96	-26	-	-6	-
75+ DNL	585	98	-	40	-
Total Population	1,246	204	16.4%	74	5.9%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-10 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario C, High-Tempo FCLP Year

	Total	Total			
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{|V_1 + V_2|} X$  100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-11 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario D, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population²	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Compari	son (Island Count	ty)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 2D					
65-70 DNL	4,280	1,105	25.8% <sup>5</sup>	352	8.2%
70-75 DNL	3,231	713	22.1%	221	6.8%
75+ DNL	5,460	916	16.8%	393	7.2%
Total Affected	12,971	2,734	21.1%	966	7.4%
Population					
Population Change from	n No Action Alter	native			
65-70 DNL	52	54	-	26	-
70-75 DNL	-232	-142	-	-31	-
75+ DNL	1,347	148	-	42	-
Total Population	1,167	60	5.1%	37	3.2%
Change from No					
Action Alternative <sup>6</sup>					

Table F-11 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario D, High-Tempo FCLP Year

	Total			Total Low-		
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low	
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income	

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1percent growth factor was applied to the 2010 census statistics to account for population changes between
  2010 and 2020 based on medium forecasted population projections during that period for Island County
  (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was
  also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the
  methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the
  community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}$ X 100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-12 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario E, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Compa	rison (Island Coui	ity)	16.9%		8.0%
No Action Alternative			T .		
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 2E					
65-70 DNL	4,546	1,140	25.1% <sup>5</sup>	356	7.8%
70-75 DNL	3,538	818	23.1%	244	6.9%
75+ DNL	4,982	893	17.9%	396	7.9%
Total Affected	13,066	2,851	21.8%	996	7.6%
Population					
Population Change fro	m No Action Alte	ernative			
65-70 DNL	318	89	-	30	-
70-75 DNL	75	-37	-	-8	-
75+ DNL	869	125	-	45	-
<b>Total Population</b>	1,262	177	14.0%	67	5.3%
Change from No					
Action Alternative <sup>6</sup>					

### Table F-12 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 2, Scenario E, High-Tempo FCLP Year

	Total			Total Low-		
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low	
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population <sup>4</sup>	Income	

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1percent growth factor was applied to the 2010 census statistics to account for population changes
  between 2010 and 2020 based on medium forecasted population projections during that period for
  Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this
  growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section
  4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island
  County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{(V_1 + V_2)}X$  100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-13 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario A, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population <sup>4</sup>	Percent Low Income
Community of Comparis	son (Island Count	y)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 3A					
65-70 DNL	4,283	1,092	25.5% <sup>5</sup>	348	8.1%
70-75 DNL	2,816	593	21.1%	191	6.8%
75+ DNL	5,531	913	16.5%	389	7.0%
Total Affected	12,630	2,598	20.6%	928	7.3%
Population					
Population Change fron	n No Action Alter	native			
-165-70 DNL	55	41	-	22	-
70-75 DNL	-647	-262	-	-61	-
75+ DNL	1,418	145	-	38	-
Population Change	826	-76	0.0%7	-1	0.0%7
from No Action Alternative <sup>6</sup>					

### Table F-13 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario A, High-Tempo FCLP Year

	Total	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low	
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income	

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}X$  100
- Due to rounding, some totals may not sum.
- <sup>7</sup> The absolute number of minority residents and the absolute number of low-income residents declined compared to the No Action Alternative.

Table F-14 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario B, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Compariso	n (Island County	)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 3B					
65-70 DNL	4,125	1,069	25.9% <sup>5</sup>	341	8.3%
70-75 DNL	3,541	817	23.1%	244	6.9%
75+ DNL	5,396	928	17.2%	399	7.4%
Total Affected	13,062	2,814	21.5%	984	7.5%
Population					
Net Change from No Acti	on Alternative				
65-70 DNL	-103	18	-	15	-
70-75 DNL	78	-38	-	-8	-
75+ DNL	1,283	160	-	48	-
Total Population Change from No Action Alternative <sup>6</sup>	1,258	140	11.1%	55	4.4%

Table F-14 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario B, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

#### Note:

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{|V_1 + V_2|} X$  100

Due to rounding, some totals may not sum.

Table F-15 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario C, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income		
Community of Compar	ison (Island Coun	ty)	16.9%		8.0%		
No Action Alternative							
65-70 DNL	4,228	1,051	24.9%	326	7.7%		
70-75 DNL	3,463	855	24.7%	252	7.3%		
75+ DNL	4,113	768	18.7%	351	8.5%		
Total Affected	11,804	2,674	22.7%	929	7.9%		
Population							
Alternative 3C							
65-70 DNL	4,767	1,174	24.6%5	363	7.6%		
70-75 DNL	3,544	824	23.3%	244	6.9%		
75+ DNL	4,671	861	18.4%	389	8.3%		
Total Affected	12,982	2,859	22.0%	996	7.7%		
Population							
<b>Population Change fro</b>	m No Action Alter	rnative					
65-70 DNL	539	123	-	37	-		
70-75 DNL	81	-31	-	-8	-		
75+ DNL	558	93	-	38	-		
Total Population	1,178	185	15.7%	67	5.7%		
Change from No							
Action Alternative <sup>6</sup>							

### Table F-15 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario C, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{|V_1 + V_2|} \times 100$
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-16 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario D, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population <sup>2</sup>	Total Minority Population <sup>3</sup>	Percent Minority	Total Low- Income Population⁴	Percent Low Income		
Community of Compariso	n (Island County	)	16.9%		8.0%		
No Action Alternative							
65-70 DNL	4,228	1,051	24.9%	326	7.7%		
70-75 DNL	3,463	855	24.7%	252	7.3%		
75+ DNL	4,113	768	18.7%	351	8.5%		
Total Affected	11,804	2,674	22.7%	929	7.9%		
Population							
Alternative 3D							
65-70 DNL	4,209	1,091	25.9% <sup>5</sup>	348	8.3%		
70-75 DNL	3,184	714	22.4%	222	7.0%		
75+ DNL	5,579	933	16.7%	395	7.1%		
Total Affected	12,972	2,738	21.1%	965	7.4%		
Population							
Population Change from	No Action Altern	ative					
65-70 DNL	-19	40	-	22	-		
70-75 DNL	-279	-141	-	-30	-		
75+ DNL	1,466	165	-	44	-		
Total Population	1,168	64	5.5%	36	3.1%		
<b>Change from No Action</b>							
Alternative <sup>6</sup>							

### Table F-16 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario D, High-Tempo FCLP Year

	Total			Total Low-	
	Affected	<b>Total Minority</b>	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1 V_2|}{|V_1 + V_2|} X$  100
- <sup>6</sup> Due to rounding, some totals may not sum.

Table F-17 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario E, High-Tempo FCLP Year

DNL Contours <sup>1</sup>	Total Affected Population²	Total Minority Population³	Percent Minority	Total Low- Income Population⁴	Percent Low Income
Community of Compariso	n (Island County)	)	16.9%		8.0%
No Action Alternative					
65-70 DNL	4,228	1,051	24.9%	326	7.7%
70-75 DNL	3,463	855	24.7%	252	7.3%
75+ DNL	4,113	768	18.7%	351	8.5%
Total Affected	11,804	2,674	22.7%	929	7.9%
Population					
Alternative 3E					
65-70 DNL	4,536	1,146	25.3% <sup>5</sup>	357	7.9%
70-75 DNL	3,590	834	23.2%	249	6.9%
75+ DNL	4,985	899	18.0%	394	7.9%
Total Affected	13,111	2,879	22.0%	1,000	7.6%
Population					
Population Change from I	No Action Alterno	ative			
65-70 DNL	308	95	-	31	-
70-75 DNL	127	-21	-	-3	-
75+ DNL	872	131	-	43	-
Total Population	1,307	205	15.7%	71	5.4%
Change from No Action Alternative <sup>6</sup>					

### Table F-17 Environmental Justice Populations at the NAS Whidbey Island Complex under Alternative 3, Scenario E, High-Tempo FCLP Year

	Total	Total		Total Low-	
	Affected	Minority	Percent	Income	Percent Low
DNL Contours <sup>1</sup>	Population <sup>2</sup>	Population <sup>3</sup>	Minority	Population⁴	Income

Sources: USCB 2012c, 2012f, n.d.[f].

- DNL contours extend into Jefferson and San Juan Counties. However, because no permanent residences are located within these DNL contours, these counties have been excluded from the analysis. Populations on military properties with in the DNL contours (NAS Whidbey Island [Ault Field], the Seaplane Base, and OLF Coupeville) have also been excluded from the analysis.
- <sup>2</sup> All population estimates for areas under the DNL contours utilized 2010 U.S. Census Bureau data. A 7.1-percent growth factor was applied to the 2010 census statistics to account for population changes between 2010 and 2020 based on medium forecasted population projections during that period for Island County (Washington State Office of Financial Management, 2017). To simplify the analysis, this growth factor was also used for areas of Skagit County that fall under the 65+ dB DNL contours. Section 4.11.2.2 describes the methodology utilized in the analysis in greater detail and also explains why Island County is utilized as the community of comparison throughout the analysis.
- Minority is defined as individuals who are members of the following population groups: American Indian or Alaska Native, Asian, Native Hawaiian or Pacific Islander, or Black or African American, as well as individuals who self-identify as of Hispanic or Latino origin who are White. Individuals who self-identify as Hispanic or Latino from another race are already included in the analysis.
- The analysis relied on poverty data from the 2006-2010 American Community Survey 5-Year Estimates because the U.S. Census Bureau no longer reports poverty data in the decennial census. The American Community Survey does not estimate data at the census block group level; therefore, the percent of the population below the poverty level is displayed in this table at the census tract level. Consequently, census block groups within the same census tract will report the same value.
- The grey-shaded cells indicate the alternatives/scenarios that contain percentages of minority populations that are "meaningfully greater" than those in Island County as a whole or that contain percentages of low-income populations that are greater than those in Island County. These shaded cells indicate where environmental justice communities have been identified based upon the indicated thresholds. The following formula (the percent difference between two percentages) was used to calculate whether these statistics differed by more than 15 percent:  $\frac{|V_1-V_2|}{(V_1+V_2)}X$  100
- <sup>6</sup> Due to rounding, some totals may not sum.

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