NGOM TAC split Considerations

Updated for September 2017 AP/Committee/Council Meetings

NGOM as Council Priority: At its April meeting, the New England Council approved a problem statement and goals for managing the NGOM management area. The Council identified the problem as unknown biomass and recent high landings from the management area, with a goal of developing tools in order to fully understanding total removals from the area and improving management. **On June 1, the scallop Committee passed the following tasking motion for the PDT to develop options that consider both the historic TAC and historic removals from the NGOM management area:**

Motion 7: Stockwell/Kendall

The Committee tasks the PDT with developing options for splitting the NGOM TAC using a hybrid approach to splitting the NGOM TAC between the LA and LAGC component.

Rationale: One concept is to use an initial "floor" of lbs, a percentage split between groups, and a maximum amount of pounds from the NGOM. It would be helpful to see tables of how this approach would work under a range of TAC options.

The motion carried on a show of hands: 10/0/0

A goal for the September meetings is to have the AP and Committee consider a range of alternatives for:

1. The Overall TAC for the NGOM area.
2. The distribution of the NGOM TAC between fishery components.
3. Limited access harvest approaches.

To keep this timeline, the PDT will need to address each of these issues in August after survey work in the area is completed, and develop a reasonable range of values for the Committee to consider. The Committee will be meeting in September, October, and November, and will have a chance to weigh in on these draft measures ahead before selecting a preferred alternative.

FOR AP/Committee/Council: Review survey information and biomass estimates. Discuss potential TACs for NGOM area, range of potential LAGC and LA split based on the TAC, and ideas for LA harvest approaches.

Current status of NGOM TAC: Through Amendment 11 and subsequent FW adjustments, the Council has set a NGOM TAC for the LAGC component. This TAC has been based on historical landings from the area (TAC at 70,000 lbs from 2008 to 2016), and most recently using survey information. LA vessels currently operate under DAS when fishing in the Gulf of Maine; there is not an overall landing limit from the NGOM management area for these vessels.

Qualifying Criteria by Permit Category: Limited entry into the Atlantic sea scallop fishery began in 1994 through Amendment 4 to the FMP. See Table 1 for a summary of the limited access programs in the fishery.

Table 1 - Summary of scallop permit categories and qualifying criteria.

Permit Type	Year Created	Action	Qualifying Criteria	Permit Category
Limited Access (Multiple categories)	1994	Amendment 4	One trip with more than 400 pounds in either 1988 or 1989, extended for new vessels under construction	Based on number of days used in 1990, or average of 1985-1990 days
LAGC IFQ	2008	Amendment 11	Possess Open Access GC permit	1,000 pounds landings in a year (FY2000-2004), individual allocation based on best year indexed by # of years active in the fishery
LAGC NGOM	2008	Amendment 11	Possess Open Access GC permit	No landings history required
LAGC Incidental	2008	Amendment 11	Possess Open Access GC permit	No landings history required

Existing Allocation between LA and LAGC IFQ: The existing allocation split between the LA and LAGC IFQ components is 94.5% LA / 5.5% IFQ of the annual projected landings. During the Amendment 11 process, the Council considered landings history as a basis for allocating between the two components. A lower and upper bound for a LAGC IFQ allocation (2.5% - 11%) of the total available scallop harvest was approved as a range for consideration at that time. The rationale for the lower bound of the range was to consider the approximate historical average from when Amendment 4 was implemented to 2005 (1994-2005). The rationale for the upper bound was to consider an amount that reflects the percent of the most recent landings (based on available data from fishing year 2005) from vessels with general category permits before the control date.

Harvest Limits by Permit Type: Harvest limits vary within the scallop FMP by permit category. Table 2 summarizes the existing harvest limits and the various forms of allocations across permit categories (ex: DAS, IFQ, etc.).

Table 2 - Summary of harvest limits and allocation types by permit category

Permit Type	Harvest Limits	Vessel allocation?	Form of allocation
Limited Access	94.5% of annual projected landing, after set-asides and incidental catch removed	Yes	DAS and access area trips
LAGC IFQ	5.5% of annual projected landing, after set-asides and incidental catch removed	Yes	IFQ pounds; set # AA trips at fleet level
LAGC NGOM	Up to TAC for management area, not linked to annual projected landings estimate	No	Harvest in area until LAGC fleet reaches TAC
LAGC Incidental	Deducted from annual projected landings before allocating to LA and LAGC IFQ	No	Harvest allowed until limit is reached

Considerations:

a) A simple, straightforward approach to setting and splitting a TAC between fishery components increases the likelihood that NGOM measures can be in place for the start of FY2018. A complex or controversial approach would likely delay the development and implementation of NGOM measures beyond the start of the 2018 fishing year.

b) The NGOM TAC represents a limit for removals from the area. It is not an allocation to a specific permit type.

c) The NGOM TAC may be set and split temporarily through a Framework; however, a permanent division in the NGOM TAC between fishery components would likely require an Amendment.

d) The NGOM management area was created in 2008 through Amendment 11. The Council's vision for the LAGC component was a fleet made up of relatively small vessels, with possession limits to maintain the historical character of the fleet and provide opportunities to various participants including vessels from small communities. The southern boundary bi-sects statistical reporting area 514 in the Gulf of Maine.

e) LAGC removals from the area come from both IFQ and NGOM permit holders.

f) LAGC vessels have different reporting requirements than LA vessels when fishing in this area.
    a. LAGC vessels declare into the NGOM management area through VMS. Landings are calculated using dealer reports for declared trips.
    b. LA vessels operate under a DAS as if in an open area of the fishery. Removals from the NGOM management area for FY 2016 were estimated using point-location VTR reports for FY 2016; this method of estimating LA removals from the NGOM has proven difficult as LA vessels can fish both inside and outside the NGOM in the same trip.
    c. The estimate of LA removals from the NGOM in 2017 used VMS, VTR, and dealer data. VMS polls indicate that some LA vessels operated inside and outside of the NGOM on a single trip.

g) VTR data is available from 1996 – present. This data has limitations, and working with it will take time/resources, depending on the level of detail request (ex: tracking catch by GC component pre-NGOM).

h) Monitoring a TAC as currently implemented in the NGOM for the LA component is challenging (as illustrated in FY 2017). Given the current reporting requirements, it may not be possible to monitor Limited Access removals as quickly as necessary. Potential approaches to monitoring

activity in the area include 1) setting up a VMS code for LA fishing in the NGOM, and 2) setting a trip catch limit for LA fishing in the NGOM.

Potential considerations for shares of the NGOM TAC: Committee tasked the PDT on June 1, 2017 to develop a range of alternatives based on c) Hybrid approach of historic TAC and historic removals from the NGOM management area.

a) *Historic TAC in the management area.* For example, the TAC for the area was set at 70,000 lbs for the LAGC component for nearly all years since the inception of the program.

b) *Split based on historic removals from the NGOM management area by fishery component.* For example, dealer data is available from 2008 – present for the LAGC component. LA landings from the area would need to be estimated.

c) *Hybrid Approach of Historic TAC and historic removals from the area (combine a and b).* For example, start with a baseline of pounds to a component of the fishery, and then consider how harvest over and above that value is distributed.
   a. See EXAMPLES of TAC shares between the LAGC and LA in Table 9 and Table 10. NOTE: these are examples of how the hybrid approach could work using recent LAGC TACs for discussion purposes.

d) *Sunset provision:* For example, develop a short-term approach that would remain in place for a set number of years. The Council has identified work on the NGOM management as a potential priority for 2018.

Table 3 – Example of available data. Comparison of actual and potential LAGC and LA landings from FY2017 (area closed before LAGC TAC achieved)

Scenario	LAGC	LA harvest	LAGC % landings
2017 landings	44,557	1,578,020	2.7%
2017 TAC	95,000	1,578,020	5.7%
2017 TAC – including reduction for overage	73,371	1,578,020	4.4%

Figure 1 - Example of how hybrid TAC split approach woudl work

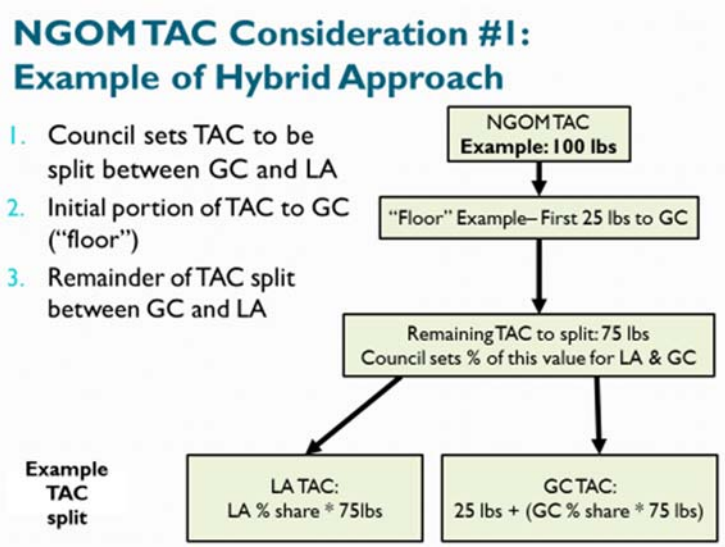

Table 4 - NGOM Fishery Data from 2008 - 2017

	A	B	C	D	E	F	G	H
1	Fishing Year	LAGC Landings (lbs)	LA Landings (lbs)	Total Landings (lbs)	LAGC % Landings	TAC	TAC - overages	LAGC Landings as % of TAC (F-B)
2	2008	9,936	0	9,936	100.0%	70,000	70,000	14.2%
3	2009	5,793	0	5,793	100.0%	70,000	70,000	8.3%
4	2010	8,639	0	8,639	100.0%	70,000	70,000	12.3%
5	2011	6,908	0	6,908	100.0%	70,000	70,000	9.9%
6	2012	7,440	0	7,440	100.0%	70,000	70,000	10.6%
7	2013	55,450	0	55,450	100.0%	70,000	70,000	79.2%
8	2014	57,842	0	57,842	100.0%	70,000	70,000	82.6%
9	2015	72,546	0	72,546	100.0%	70,000	70,000	103.6%
10	2016	89,083	292,517	381,600	23.3%	70,000	67,454	127.3%
11	2017	44,557	1,578,020	1,622,577	2.7%	95,000	73,371	46.9%
12	Note: The 2016 TAC in the NGOM was based on historic landings data (as were all TACs from 2008-2016). The 2017 TAC was informed by the UMaine/ME DMR survey of the area. Biomass estimates were developed assuming a dredge efficiency of 0.4, and include animals >88.9mm. The Council recommended setting the TAC using an exploitation rate of 0.2 (2,055,240), and selected the q 0.15 value (411,048 lbs). The LAGC TAC was set by applying the ratio of GC to LA landings from the 2016 FY (23%) – this is how the Council arrived at the 95,000 lb LAGC TAC. The LAGC exceeded its TAC in 2015 and 2016, so final TAC was reduced to account for this overage in subsequent years.							

Table 5 - Potential General Category Share of TAC using hybrid TAC sharing approach, with baseline 95,000lb TAC (0% - 50% share to GC).

	a	b	c	d	e	f	g	h	i	j	k	l
	TAC/Split %	**0%**	**5%**	**10%**	**15%**	**20%**	**25%**	**30%**	**35%**	**40%**	**45%**	**50%**
1	**0**	0	0	0	0	0	0	0	0	0	0	0
2	**70,000**	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000
3	**95,000**	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000
4	**100,000**	95,000	95,250	95,500	95,750	96,000	96,250	96,500	96,750	97,000	97,250	97,500
5	**125,000**	95,000	96,500	98,000	99,500	101,000	102,500	104,000	105,500	107,000	108,500	110,000
6	**150,000**	95,000	97,750	100,500	103,250	106,000	108,750	111,500	114,250	117,000	119,750	122,500
7	**175,000**	95,000	99,000	103,000	107,000	111,000	115,000	119,000	123,000	127,000	131,000	135,000
8	**200,000**	**95,000**	**100,250**	**105,500**	**110,750**	**116,000**	**121,250**	**126,500**	**131,750**	**137,000**	**142,250**	**147,500**
9	**225,000**	95,000	101,500	108,000	114,500	121,000	127,500	134,000	140,500	147,000	153,500	160,000
10	**250,000**	95,000	102,750	110,500	118,250	126,000	133,750	141,500	149,250	157,000	164,750	172,500
11	**275,000**	95,000	104,000	113,000	122,000	131,000	140,000	149,000	158,000	167,000	176,000	185,000
12	**300,000**	95,000	105,250	115,500	125,750	136,000	146,250	156,500	166,750	177,000	187,250	197,500
13	**325,000**	95,000	106,500	118,000	129,500	141,000	152,500	164,000	175,500	187,000	198,500	210,000
14	**350,000**	95,000	107,750	120,500	133,250	146,000	158,750	171,500	184,250	197,000	209,750	222,500
15	**375,000**	95,000	109,000	123,000	137,000	151,000	165,000	179,000	193,000	207,000	221,000	235,000
16	**400,000**	95,000	110,250	125,500	140,750	156,000	171,250	186,500	201,750	217,000	232,250	247,500
17	**425,000**	95,000	111,500	128,000	144,500	161,000	177,500	194,000	210,500	227,000	243,500	260,000
18	**450,000**	95,000	112,750	130,500	148,250	166,000	183,750	201,500	219,250	237,000	254,750	272,500
19	**475,000**	95,000	114,000	133,000	152,000	171,000	190,000	209,000	228,000	247,000	266,000	285,000
20	**500,000**	95,000	115,250	135,500	155,750	176,000	196,250	216,500	236,750	257,000	277,250	297,500
21	**750,000**	95,000	127,750	160,500	193,250	226,000	258,750	291,500	324,250	357,000	389,750	422,500
22	**1,000,000**	95,000	140,250	185,500	230,750	276,000	321,250	366,500	411,750	457,000	502,250	547,500
23	**2,000,000**	95,000	190,250	285,500	380,750	476,000	571,250	666,500	761,750	857,000	952,250	1,047,500
24	**4,000,000**	95,000	290,250	485,500	680,750	876,000	1,071,250	1,266,500	1,461,750	1,657,000	1,852,250	2,047,500
25	**5,000,000**	95,000	340,250	585,500	830,750	1,076,000	1,321,250	1,566,500	1,811,750	2,057,000	2,302,250	2,547,500

Table 6 - Potential LA share of TAC using hybrid TAC sharing approach, with baseline 95,000lb TAC (0% - 50% share to GC).

	a	b	c	d	e	f	g	h	i	j	k	l
	Split %	**0%**	**5%**	**10%**	**15%**	**20%**	**25%**	**30%**	**35%**	**40%**	**45%**	**50%**
1	0	0	0	0	0	0	0	0	0	0	0	0
2	70,000	0	0	0	0	0	0	0	0	0	0	0
3	95,000	0	0	0	0	0	0	0	0	0	0	0
4	100,000	5,000	4,750	4,500	4,250	4,000	3,750	3,500	3,250	3,000	2,750	2,500
5	125,000	30,000	28,500	27,000	25,500	24,000	22,500	21,000	19,500	18,000	16,500	15,000
6	150,000	55,000	52,250	49,500	46,750	44,000	41,250	38,500	35,750	33,000	30,250	27,500
7	175,000	80,000	76,000	72,000	68,000	64,000	60,000	56,000	52,000	48,000	44,000	40,000
8	**200,000**	**105,000**	**99,750**	**94,500**	**89,250**	**84,000**	**78,750**	**73,500**	**68,250**	**63,000**	**57,750**	**52,500**
9	225,000	130,000	123,500	117,000	110,500	104,000	97,500	91,000	84,500	78,000	71,500	65,000
10	250,000	155,000	147,250	139,500	131,750	124,000	116,250	108,500	100,750	93,000	85,250	77,500
11	275,000	180,000	171,000	162,000	153,000	144,000	135,000	126,000	117,000	108,000	99,000	90,000
12	300,000	205,000	194,750	184,500	174,250	164,000	153,750	143,500	133,250	123,000	112,750	102,500
13	325,000	230,000	218,500	207,000	195,500	184,000	172,500	161,000	149,500	138,000	126,500	115,000
14	350,000	255,000	242,250	229,500	216,750	204,000	191,250	178,500	165,750	153,000	140,250	127,500
15	375,000	280,000	266,000	252,000	238,000	224,000	210,000	196,000	182,000	168,000	154,000	140,000
16	400,000	305,000	289,750	274,500	259,250	244,000	228,750	213,500	198,250	183,000	167,750	152,500
17	425,000	330,000	313,500	297,000	280,500	264,000	247,500	231,000	214,500	198,000	181,500	165,000
18	450,000	355,000	337,250	319,500	301,750	284,000	266,250	248,500	230,750	213,000	195,250	177,500
19	475,000	380,000	361,000	342,000	323,000	304,000	285,000	266,000	247,000	228,000	209,000	190,000
20	500,000	405,000	384,750	364,500	344,250	324,000	303,750	283,500	263,250	243,000	222,750	202,500
21	750,000	655,000	622,250	589,500	556,750	524,000	491,250	458,500	425,750	393,000	360,250	327,500
22	1,000,000	905,000	859,750	814,500	769,250	724,000	678,750	633,500	588,250	543,000	497,750	452,500
23	2,000,000	1,905,000	1,809,750	1,714,500	1,619,250	1,524,000	1,428,750	1,333,500	1,238,250	1,143,000	1,047,750	952,500
24	4,000,000	3,905,000	3,709,750	3,514,500	3,319,250	3,124,000	2,928,750	2,733,500	2,538,250	2,343,000	2,147,750	1,952,500
25	5,000,000	4,905,000	4,659,750	4,414,500	4,169,250	3,924,000	3,678,750	3,433,500	3,188,250	2,943,000	2,697,750	2,452,500

Table 7 – Potential General Category Share of TAC using hybrid TAC sharing approach, with baseline 95,000lb TAC (55% - 100% share to GC)

	m	n	o	p	q	r	s	t	u	v	w
	Split %	**55%**	**60%**	**65%**	**70%**	**75%**	**80%**	**85%**	**90%**	**95%**	**100%**
1	**0**	0	0	0	0	0	0	0	0	0	0
2	**70,000**	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000	70,000
3	**95,000**	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000	95,000
4	**100,000**	97,750	98,000	98,250	98,500	98,750	99,000	99,250	99,500	99,750	100,000
5	**125,000**	111,500	113,000	114,500	116,000	117,500	119,000	120,500	122,000	123,500	125,000
6	**150,000**	125,250	128,000	130,750	133,500	136,250	139,000	141,750	144,500	147,250	150,000
7	**175,000**	139,000	143,000	147,000	151,000	155,000	159,000	163,000	167,000	171,000	175,000
8	**200,000**	152,750	158,000	163,250	168,500	173,750	179,000	184,250	189,500	194,750	200,000
9	**225,000**	166,500	173,000	179,500	186,000	192,500	199,000	205,500	212,000	218,500	225,000
10	**250,000**	180,250	188,000	195,750	203,500	211,250	219,000	226,750	234,500	242,250	250,000
11	**275,000**	194,000	203,000	212,000	221,000	230,000	239,000	248,000	257,000	266,000	275,000
12	**300,000**	207,750	218,000	228,250	238,500	248,750	259,000	269,250	279,500	289,750	300,000
13	**325,000**	221,500	233,000	244,500	256,000	267,500	279,000	290,500	302,000	313,500	325,000
14	**350,000**	235,250	248,000	260,750	273,500	286,250	299,000	311,750	324,500	337,250	350,000
15	**375,000**	249,000	263,000	277,000	291,000	305,000	319,000	333,000	347,000	361,000	375,000
16	**400,000**	262,750	278,000	293,250	308,500	323,750	339,000	354,250	369,500	384,750	400,000
17	**425,000**	276,500	293,000	309,500	326,000	342,500	359,000	375,500	392,000	408,500	425,000
18	**450,000**	290,250	308,000	325,750	343,500	361,250	379,000	396,750	414,500	432,250	450,000
19	**475,000**	304,000	323,000	342,000	361,000	380,000	399,000	418,000	437,000	456,000	475,000
20	**500,000**	317,750	338,000	358,250	378,500	398,750	419,000	439,250	459,500	479,750	500,000
21	**750,000**	455,250	488,000	520,750	553,500	586,250	619,000	651,750	684,500	717,250	750,000
22	**1,000,000**	592,750	638,000	683,250	728,500	773,750	819,000	864,250	909,500	954,750	1,000,000
23	**2,000,000**	1,142,750	1,238,000	1,333,250	1,428,500	1,523,750	1,619,000	1,714,250	1,809,500	1,904,750	2,000,000
24	**4,000,000**	2,242,750	2,438,000	2,633,250	2,828,500	3,023,750	3,219,000	3,414,250	3,609,500	3,804,750	4,000,000
25	**5,000,000**	2,792,750	3,038,000	3,283,250	3,528,500	3,773,750	4,019,000	4,264,250	4,509,500	4,754,750	5,000,000

Table 8 - Potential LA share of TAC using hybrid TAC sharing approach, with baseline 95,000lb TAC (55% - 100% share to GC).

	l	m	n	o	p	q	r	s	t	u	v
	Split %	**55%**	**60%**	**65%**	**70%**	**75%**	**80%**	**85%**	**90%**	**95%**	**100%**
1	**0**	0	0	0	0	0	0	0	0	0	0
2	**70,000**	0	0	0	0	0	0	0	0	0	0
3	**95,000**	0	0	0	0	0	0	0	0	0	0
4	**100,000**	2,250	2,000	1,750	1,500	1,250	1,000	750	500	250	0
5	**125,000**	13,500	12,000	10,500	9,000	7,500	6,000	4,500	3,000	1,500	0
6	**150,000**	24,750	22,000	19,250	16,500	13,750	11,000	8,250	5,500	2,750	0
7	**175,000**	36,000	32,000	28,000	24,000	20,000	16,000	12,000	8,000	4,000	0
8	**200,000**	47,250	42,000	36,750	31,500	26,250	21,000	15,750	10,500	5,250	0
9	**225,000**	58,500	52,000	45,500	39,000	32,500	26,000	19,500	13,000	6,500	0
10	**250,000**	69,750	62,000	54,250	46,500	38,750	31,000	23,250	15,500	7,750	0
11	**275,000**	81,000	72,000	63,000	54,000	45,000	36,000	27,000	18,000	9,000	0
12	**300,000**	92,250	82,000	71,750	61,500	51,250	41,000	30,750	20,500	10,250	0
13	**325,000**	103,500	92,000	80,500	69,000	57,500	46,000	34,500	23,000	11,500	0
14	**350,000**	114,750	102,000	89,250	76,500	63,750	51,000	38,250	25,500	12,750	0
15	**375,000**	126,000	112,000	98,000	84,000	70,000	56,000	42,000	28,000	14,000	0
16	**400,000**	137,250	122,000	106,750	91,500	76,250	61,000	45,750	30,500	15,250	0
17	**425,000**	148,500	132,000	115,500	99,000	82,500	66,000	49,500	33,000	16,500	0
18	**450,000**	159,750	142,000	124,250	106,500	88,750	71,000	53,250	35,500	17,750	0
19	**475,000**	171,000	152,000	133,000	114,000	95,000	76,000	57,000	38,000	19,000	0
20	**500,000**	182,250	162,000	141,750	121,500	101,250	81,000	60,750	40,500	20,250	0
21	**750,000**	294,750	262,000	229,250	196,500	163,750	131,000	98,250	65,500	32,750	0
22	**1,000,000**	407,250	362,000	316,750	271,500	226,250	181,000	135,750	90,500	45,250	0
23	**2,000,000**	857,250	762,000	666,750	571,500	476,250	381,000	285,750	190,500	95,250	0
24	**4,000,000**	1,757,250	1,562,000	1,366,750	1,171,500	976,250	781,000	585,750	390,500	195,250	0
25	**5,000,000**	2,207,250	1,962,000	1,716,750	1,471,500	1,226,250	981,000	735,750	490,500	245,250	0

Table 9 - EXAMPLE of Hybrid Approach, assuming first 70,000 lbs go to General Category Harvest, and then a percent split of the remaining lbs between LA and LAGC

	LAGC: first **70,000** of NGOM TAC							
	First 70,000 to GC, 5% above 70,000 to GC		First 70,000 to GC, 10% above 70,000 to GC		First 70,000 to GC, 15% above 70,000 to GC		First 70,000 to GC, 20% above 70,000 to GC	
Split %	0.05		0.1		0.15		0.2	
TAC	**GC**	**LA**	**GC**	**LA**	**GC**	**LA**	**GC**	**LA**
0	0	0	0	0	0	0	0	0
70000	70000	0	70000	0	70000	0	70000	0
95000	71250	23750	72500	22500	73750	21250	75000	20000
100000	71500	28500	73000	27000	74500	25500	76000	24000
125000	72750	52250	75500	49500	78250	46750	81000	44000
150000	74000	76000	78000	72000	82000	68000	86000	64000
175000	75250	99750	80500	94500	85750	89250	91000	84000
200000	76500	123500	83000	117000	89500	110500	96000	104000
225000	77750	147250	85500	139500	93250	131750	101000	124000
250000	79000	171000	88000	162000	97000	153000	106000	144000
275000	80250	194750	90500	184500	100750	174250	111000	164000
300000	81500	218500	93000	207000	104500	195500	116000	184000
325000	82750	242250	95500	229500	108250	216750	121000	204000
350000	84000	266000	98000	252000	112000	238000	126000	224000
375000	85250	289750	100500	274500	115750	259250	131000	244000
400000	86500	313500	103000	297000	119500	280500	136000	264000
425000	87750	337250	105500	319500	123250	301750	141000	284000
450000	89000	361000	108000	342000	127000	323000	146000	304000
500000	91500	408500	113000	387000	134500	365500	156000	344000
750000	104000	646000	138000	612000	172000	578000	206000	544000
1000000	116500	883500	163000	837000	209500	790500	256000	744000
2000000	166500	1833500	263000	1737000	359500	1640500	456000	1544000
4000000	266500	3733500	463000	3537000	659500	3340500	856000	3144000

Table 10 - EXAMPLE of Hybrid Approach, assuming first 95,000 lbs go to General Category Harvest, and then a percent split of the remaining lbs between LA and LAGC

	LAGC: first **95,000** of NGOM TAC							
	First 95,000 to GC, 5% above 95,000 to GC		First 95,000 to GC, 10% above 95,000 to GC		First 95,000 to GC, 15% above 95,000 to GC		First 95,000 to GC, 20% above 95,000 to GC	
Split %	0.05		0.1		0.15		0.2	
TAC	**GC**	**LA**	**GC**	**LA**	**GC**	**LA**	**GC**	**LA**
0	0	0	0	0	0	0	0	0
70000	70000	0	70000	0	70000	0	70000	0
95000	95000	0	95000	0	95000	0	95000	0
100000	95250	4750	95500	4500	95750	4250	96000	4000
125000	96500	28500	98000	27000	99500	25500	101000	24000
150000	97750	52250	100500	49500	103250	46750	106000	44000
175000	99000	76000	103000	72000	107000	68000	111000	64000
200000	100250	99750	105500	94500	110750	89250	116000	84000
225000	101500	123500	108000	117000	114500	110500	121000	104000
250000	102750	147250	110500	139500	118250	131750	126000	124000
275000	104000	171000	113000	162000	122000	153000	131000	144000
300000	105250	194750	115500	184500	125750	174250	136000	164000
325000	106500	218500	118000	207000	129500	195500	141000	184000
350000	107750	242250	120500	229500	133250	216750	146000	204000
375000	109000	266000	123000	252000	137000	238000	151000	224000
400000	110250	289750	125500	274500	140750	259250	156000	244000
425000	111500	313500	128000	297000	144500	280500	161000	264000
450000	112750	337250	130500	319500	148250	301750	166000	284000
500000	115250	384750	135500	364500	155750	344250	176000	324000
750000	127750	622250	160500	589500	193250	556750	226000	524000
1000000	140250	859750	185500	814500	230750	769250	276000	724000
2000000	190250	1809750	285500	1714500	380750	1619250	476000	1524000
4000000	290250	3709750	485500	3514500	680750	3319250	876000	3124000