

Appendix D
Habitat Management Plan Cost Estimate



FORT ORD REUSE AUTHORITY

REGULAR MEETING
FORT ORD REUSE AUTHORITY (FORA) HABITAT WORKING GROUP (HWG)
and
SPECIAL MEETING OF THE FORA ADMINISTRATIVE COMMITTEE
Friday, February 21, 2020 at 10:00 a.m.
910 2nd Avenue, Marina, CA 93933 (Carpenters Hall)

AGENDA

1. CALL TO ORDER

2. PUBLIC COMMENT PERIOD

Members of the public wishing to address the Committee on matters within its jurisdiction may do so for up to 3 minutes and will not receive Committee action. Whenever possible, written correspondence should be submitted to the Committee in advance of the meeting, to provide adequate time for its consideration.

3. BUSINESS ITEMS

- | | |
|--|--------------------|
| a. Today's Meeting Objective | INFORMATION |
| b. February 14, 2020 meeting recap | INFORMATION |
| c. Habitat Management Plan (HMP) - Cost Model presentation | INFORMATION/ACTION |
| d. CEQA Attorney - Habitat Conservation Plan (HCP) / EIR options | INFORMATION/ACTION |
| e. Other discussion | |

4. FUTURE AGENDA ITEMS

DISCUSSION

Receive communication from Committee members as it pertains to future agenda items.

5. ADJOURNMENT

NEXT MEETING: February 28, 2020



APPROVED

REGULAR MEETING

FORT ORD REUSE AUTHORITY (FORA) HABITAT WORKING GROUP (HWG)

And

SPECIAL MEETING OF THE FORA ADMINISTRATIVE COMMITTEE

10:00 a.m. Friday, February 21, 2020 | Carpenters Union Hall
910 2nd Avenue, Marina, CA 93933

1. CALL TO ORDER

Co-Chair Jane Parker called the meeting to order at 10:05 a.m.

The following FORA Board and Administration Committee members were present:

Supervisor Jane Parker (Monterey County) – Co-Chair

Melanie Beretti (County of Monterey)

Patrick Breen (MCWD)

Councilmember John Gaglioti (City of Del Rey Oaks)

Councilmember Alan Haffa (City of Monterey)

Layne Long (City of Marina)

Craig Malin (City of Seaside)

David Martin (MPC)

Steve Matarazzo (UCSC)

Mayor Pro Tem Gail Morton (City of Marina)

Vicki Nakamura (MPC)

Councilmember Frank O'Connell (City of Marina)

Mayor Ian Oglesby (City of Seaside)

Supervisor Jane Parker (Monterey County)

Dino Pick (City of Del Rey Oaks)

Anya Spear (CSUMB)

Hans Uslar (City of Monterey)

Members of the Consultant Team included:

Kendall Flint (RGS)

Aaron Gabbe (ICF)

Erin Harwayne (DDA)

Ellen Martin (EPS)

David Willoughby (KAG)

FORA Staff:
Joshua Metz – Co-Chair
Harrison Tregenza

2. PUBLIC COMMENT PERIOD

Public comment was received.

3. BUSINESS ITEMS

a. Today's Meeting Objective

Ms. Parker went over the agenda for the meeting and noted that the objective was to have a good conversation.

b. February 14, 2020 meeting recap

Mr. Metz noted that FORA attorneys are reviewing the JPA document with the jurisdictions' redlines and that they will bring it back for review and consideration at subsequent meetings.

c. Habitat Management Plan (HMP) – Cost Model presentation

Mr. Gabbe gave a presentation on the HMP cost model. He started by going over the methods and assumptions that he used to create the HMP cost model. He broke down the cost model by jurisdiction, species, acreage, and responsibilities and answered questions from the committee. He discussed the differences between the HMP and HCP, and the details regarding species' takes and mitigation. Ms. Morton asked if it would be possible for the Bureau of Land Management (BLM) to compile all reports from the last five years and have them posted on FORA's website. Mr. Metz affirmed that he'd work with Mr. Morgan of BLM to get all the reports and put them on the website for jurisdictions to access. Mr. Pick noted that the regulatory agencies will be in charge of these things, and would like them on the phone next time. Ms. Parker wrapped up the item due to time constraints and noted that this was a good conversation, but that it will need to be discussed in future meetings.

d. CEQA Attorney – Habitat Conservation Plan (HCP) / EIR options

Mr. Metz noted that as instructed by the FORA Board, FORA staff requested Holland & Knight (HK) provide a legal opinion regarding CEQA/NEPA ramifications regarding the HCP EIR/EIS. Mr. Willoughby walked the HWG through the legal memo provided by HK. He broke down the five options as laid out in the memo as well as the details of EIR certification. Mr. Willoughby then answered questions from members of the HWG regarding the contents of the memo. Following this, Ms. Flint gave a presentation on HCP/EIR considerations. She broke down HK's five options in terms of who the lead agency would be and the benefits and challenges of each. She then showed the HWG an action calendar for all the steps that would need to take place to publish and certify an EIR before FORA's sunset.

e. Other discussion

None

4. FUTURE AGENDA ITEMS

Not discussed.

5. ADJOURNMENT at 12:15 p.m.

Former Fort Ord Habitat Management Plan Cost Estimate

Habitat Working Group
February 21, 2020

Aaron Gabbe, Ph.D. ICF
Bernadette Clueit, ICF
Ellen Martin, EPS
Erin Harwayne, DD&A

Draft Cost Estimates for each Jurisdiction to Implement the HMP

- **HMP responsibilities**
- **Methods and assumptions to estimate HMP costs**
- **Draft cost estimate, by jurisdiction**
- **Conclusions**

HMP Responsibilities

- **Develop Resource Management Plans (RMPs) for Habitat Management Areas (HMAs)**
- **Annual reporting to USFWS, CDFW, BLM**
- **Environmental Compliance**

HMP Responsibilities

- **Habitat enhancement and maintenance**
 - **Non-native species control**
 - **Erosion control**
 - **Vegetation management (controlled burns, grazing, mechanical)**
 - **Road and trail maintenance**
 - **Security and access control**

Methods and Assumptions I

- **RMPs have not been developed!**
 - Not enough details about “what will be done” and “how much” to manage & restore to accurately estimate cost of HMP implementation

Methods and Assumptions I

- **Costs for tasks extrapolated from the HCP cost model**
 - **Beyond scope to create new cost estimates and model for HMP**
 - **HCP cost model best guide - HCP based on HMP**
 - **50 + linked Excel worksheets**
 - **Assumptions inform extrapolations**
- **Eliminated HCP-specific tasks (e.g., restore E. Garrison pond for CTS, HCP contingency fund)**
- **Reduced cost of some HCP tasks with less per unit effort under HMP (e.g., monitoring & adaptive management)**

Table N-7a Plant Monitoring

*Baseline uses 1st year estimates from HCP only
**No statistical analysis for baseline, some assumed after during monitoring
***All plant surveys require same effort than pilena
****Source of species and habitat data: excel workbook 'ICF HMP Data Request', Land Cover by HMA and HMP Species by HMA from Erin H.
*****Plots are assumed to be 1 acre in size per Worksheet M-7a Plant Monitor_high
*****For abundance sampling, assume 10% of habitat is surveyed every year

Acreage total
MOCO 1849
Marina 238
MPC 208
MRPD 19
SP 979
UC 608

Table with columns: Cost Item, Notes, Unit, Unit/yr, \$/Unit, Avg Annual Cost, Interval, Frequency, Total 50 Year Cost, Frequency Codes, Fixed cost, Annual Cost per acre, Percent of acreage surveyed per year, and various site codes (East Garrison, Habitat Corridor, Travel Camp, Oak Oval, Parker Flats, Landfill E8a.1, Wolf Hill, Lookout Ridge, Salinas River, Airport Reserve, Northwest Corner, Peninsula College, Regional Park, UC, State Parks).

Methods and Assumptions II

- **Most costs not readily extractable from HCP cost model**
 - HCP costs estimated base-wide
 - HCP cost model assumes extensive sharing of resources
 - Staffing
 - Knowledge (i.e., land management experts)
 - Capital
- **Extensive assumptions made and documented to allocate HMP costs to individual jurisdictions from HCP cost model line-items**

Methods and Assumptions III

- **Costs estimated for HMAs and development parcels with management responsibilities**
- **HCP cost categories used for HMP cost estimates**
 - **Allows direct comparison of relative costs**
- **Cost estimated per acre or linear feet, where feasible**
- **Cost allocated based on size of HMAs**

DRAFT

Table 1
Program Administration Cost Summary
HCP Cooperative

Cost Item	Start Up Costs	Average Annual Costs
Staff Costs	\$0	\$352,881
Insurance	\$0	\$35,738
Office Space and Utilities	\$0	\$38,484
General Office Equipment [1]	\$47,785	\$11,800
GIS and Database Equipment	\$0	\$8,708
Vehicles and Fuel [2] [3]	\$55,084	\$7,438
Staff Training	\$0	\$900
Legal assistance	\$0	\$20,658
Financial analysis assistance	\$0	\$2,314
Education/ Outreach/ Public Relations	\$0	\$17,214
Total	\$102,869	\$491,907

[1] UC cell phones (within General Office Equipment) to the sum of \$1,377 not included in total capital costs Years 1-50.

[2] Reflects gas and utilization costs assuming each vehicle is driven 10,000 miles per year.

[3] Includes vehicle costs not anticipated until years 21-50.

HMP Implementation Cost Estimates

- HCP start-up costs not included in HMP cost estimate

Table 1
Program Administration Cost Summary
HCP Cooperative

Cost Item	Start Up Costs	Average Annual Costs
Staff Costs	\$0	\$352,881
Insurance	\$0	\$35,736
Office Space and Utilities	\$0	\$36,464
General Office Equipment [1]	\$47,785	\$11,600
GIS and Database Equipment	\$0	\$6,706
Vehicles and Fuel [2] [3]	\$55,084	\$7,436
Staff Training	\$0	\$900
Legal assistance	\$0	\$20,656
Financial analysis assistance	\$0	\$2,314
Education/ Outreach/ Public Relations	\$0	\$17,214
Total	\$102,869	\$491,907

[1] UC cell phones (within General Office Equipment) to the sum of \$1,377 not included in total capital costs Years 1-50.

[2] Reflects gas and utilization costs assuming each vehicle is driven 10,000 miles per year.

[3] Includes vehicle costs not anticipated until years 21-50.

Table 2
Estimate of Program Administration Costs by Jurisdiction
HMP Program Administration Estimate

Cost Item	HMP Cost Estimate Method	Start Up Costs	HCP Average Annual Costs	Estimated Costs by Jurisdiction					
				Monterey County	Marina	Peninsula College	Regional Park District	Del Rey Oaks	
Staff Costs	20% of HCP costs for county; 10% for JDs with HMA, 5% for dev parcel JDs.		\$352,881	\$70,576	\$35,288	\$35,288	\$35,288	\$35,288	
Insurance	0%		\$35,736	\$0	\$0	\$0	\$0	\$0	
Office Space and Utilities	0%		\$36,464	\$0	\$0	\$0	\$0	\$0	
General Office Equipment	0%		\$11,600	\$0	\$0	\$0	\$0	\$0	
GIS and Database Equipment	50% of HCP costs for each jurisdiction		\$6,706	\$3,353	\$3,353	\$3,353	\$3,353	\$3,353	
Vehicles and Fuel [2] [3]	100% of HMA costs allocated by HMA acreage; see Table 3		Excluded [1]	\$7,436	\$5,922	\$756	\$660	\$61	\$38
Staff Training	20% of HCP costs for county; 10% for all others		\$900	\$180	\$90	\$90	\$90	\$90	
Legal assistance	75% of HCP costs for each jurisdiction		\$20,656	\$15,492	\$15,492	\$15,492	\$15,492	\$15,492	
Financial analysis assistance	100% of HCP costs for each jurisdiction		\$2,314	\$2,314	\$2,314	\$2,314	\$2,314	\$2,314	
Education/ Outreach/ Public Relations	100% of HMA costs allocated by HMA acreage; see Table 3		\$17,214	\$13,707	\$1,750	\$1,527	\$141	\$89	
TOTAL			\$491,907	\$111,544	\$59,043	\$58,724	\$56,739	\$56,665	

[1] Assumes jurisdictions will use their own vehicles and office equipment.
 [2] Reflects gas and utilization costs assuming each vehicle is driven 10,000 miles per year.
 [3] Includes vehicle costs not anticipated until years 21-50.

Table 3
Summary of Management and Monitoring Cost by HMA

Jurisdiction / HMA	Start-Up Cost					Average Annual Costs					
	Habitat Restoration	HMA Management and Maintenance	Plant Monitoring	Wildlife Monitoring	Project Management	TOTAL	HMA Management and Maintenance	Plant Monitoring	Wildlife Monitoring	Project Management & Annual Reporting	TOTAL
Monterey County											
East Garrison North E11a	\$0	\$0	\$44,549	\$1,041	\$1,530	\$47,121	\$6,933	\$31,997	\$173	\$4,386	\$43,489
East Garrison South E11b.1-E11b.8 and E11b.11	\$0	\$0	\$132,810	\$3,143	\$1,530	\$137,483	\$119,292	\$88,873	\$4,370	\$6,837	\$219,372
Habitat Corridor L20.2.1	\$0	\$0	\$37,509	\$7,447	\$1,530	\$46,486	\$230,949	\$30,189	\$9,740	\$6,413	\$277,291
Travel Camp L20.2.2	\$0	\$25,000	\$19,081	\$2,557	\$1,530	\$48,168	\$120,494	\$15,739	\$4,285	\$4,328	\$144,847
Oak Oval E19a.2 (borderlands)	\$0	\$0	\$12,862	\$663	\$1,530	\$15,056	\$38,996	\$10,038	\$232	\$2,939	\$52,205
Parker Flats E19a.1 and E21b.1 (borderlands)	\$0	\$0	\$139,029	\$2,596	\$1,530	\$143,155	\$97,757	\$98,969	\$328	\$8,709	\$205,764
Landfill E8a.1 and E8a.2	\$207,253	\$0	\$94,351	\$6,268	\$1,530	\$309,403	\$8,854	\$68,444	\$1,147	\$7,474	\$85,920
Wolf Hill L20.3	\$0	\$0	\$46,372	\$2,132	\$1,530	\$50,034	\$73,542	\$28,227	\$4,572	\$3,065	\$109,396
Lookout Ridge L20.5	\$0	\$0	\$4,495	\$7,334	\$1,530	\$13,360	\$41,365	\$4,061	\$4,100	\$5,313	\$54,838
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$200,000	\$0	\$0	\$0	\$200,000	\$20,000	\$0	\$0	\$0	\$20,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$179,023	\$0	\$0	\$0	\$179,023
Subtotal Monterey County	\$207,253	\$225,000	\$531,059	\$33,182	\$13,771	\$1,010,264	\$937,206	\$376,537	\$28,947	\$74,242	\$1,416,932
Marina											
Salinas River L5.1.12	\$0	\$0	\$3,822	\$303	\$2,295	\$6,419	\$814	\$3,503	\$99	\$5,420	\$9,836
Airport Reserve L5.1.11	\$0	\$0	\$23,021	\$908	\$2,295	\$26,224	\$2,090	\$17,969	\$264	\$7,099	\$27,422
Northwest Corner E2a	\$0	\$0	\$30,905	\$3,475	\$2,295	\$36,675	\$13,785	\$19,695	\$770	\$5,806	\$40,056
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$90,000	\$0	\$0	\$0	\$90,000	\$9,000	\$0	\$0	\$0	\$9,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$89,511	\$0	\$0	\$0	\$89,511
Subtotal Marina	\$0	\$90,000	\$57,748	\$4,685	\$6,885	\$159,319	\$115,200	\$41,168	\$1,133	\$43,113	\$200,613
Penninsula College											
Range 45	\$183,154	\$0	\$152,280	\$1,449	\$6,885	\$343,769	\$140,536	\$109,391	\$214	\$17,747	\$267,888
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$50,000	\$0	\$0	\$0	\$50,000	\$5,000	\$0	\$0	\$0	\$5,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$89,511	\$0	\$0	\$0	\$89,511
Subtotal Peninsula College	\$183,154	\$50,000	\$152,280	\$1,449	\$6,885	\$393,769	\$235,047	\$109,391	\$214	\$42,534	\$387,187
Regional Park Dist											
Natural Area Expansion L6	\$0	\$38,534	\$11,268	\$2,791	\$6,885	\$59,479	\$19,535	\$6,947	\$8,054	\$14,138	\$48,673
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$50,000	\$0	\$0	\$0	\$50,000	\$5,000	\$0	\$0	\$0	\$5,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$89,511	\$0	\$0	\$0	\$89,511
Subtotal Regional Park Dist	\$0	\$88,534	\$11,268	\$2,791	\$6,885	\$109,479	\$114,046	\$6,947	\$8,054	\$38,925	\$167,972
Del Rey Oaks											
Office Park E31a,b,c	\$0	\$13,534	\$0	\$0	\$0	\$13,534	\$17,103	\$0	\$0	\$0	\$17,103
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$50,000	\$0	\$0	\$0	\$50,000	\$5,000	\$0	\$0	\$0	\$5,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$89,511	\$0	\$0	\$0	\$89,511
Subtotal Del Rey Oaks	\$0	\$63,534	\$0	\$0	\$0	\$63,534	\$111,614	\$0	\$0	\$24,788	\$136,402
UC											
FONR S2.1.2, S2.1.3, S2.1.5, S2.3.2, S2.4	\$159,055	\$0	\$232,408	\$4,660	\$6,885	\$403,009	\$177,351	\$179,791	\$786	\$25,466	\$383,393
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$200,000	\$0	\$0	\$0	\$200,000	\$20,000	\$0	\$0	\$0	\$20,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$89,511	\$0	\$0	\$0	\$89,511
Subtotal UC	\$159,055	\$200,000	\$232,408	\$4,660	\$6,885	\$603,009	\$286,862	\$179,791	\$786	\$50,254	\$517,692
State Parks [3]											
Fort Ord Dunes S3.1.2, S3.1.1 and S3.1.3	\$1,761,176	\$26,601	\$133,824	\$8,678	\$6,885	\$1,937,164	\$62,192	\$133,824	\$83,444	\$32,664	\$312,125
Resource Management Plan (Encompasses all HMAs - update every 10 years)	\$0	\$200,000	\$0	\$0	\$0	\$200,000	\$20,000	\$0	\$0	\$0	\$20,000
Annual Monitoring Report	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$0	\$24,788	\$24,788
Contracted Labor [2]	\$0	\$0	\$0	\$0	\$0	\$0	\$89,511	\$0	\$0	\$0	\$89,511
Subtotal State Parks	\$1,761,176	\$226,601	\$133,824	\$8,678	\$6,885	\$2,137,164	\$171,703	\$133,824	\$83,444	\$57,452	\$446,424
Total	\$2,310,638	\$943,670	\$1,118,587	\$55,445	\$48,198	\$4,476,538	\$1,971,678	\$847,658	\$122,578	\$331,308	\$3,273,222

[1] Does not include capital costs or vegetation management at this time.

[2] Assumes 2 FTEs for Monterey County and 1 FTE for all others.

[3] Restoration assumptions reflect reduction for restoration and restoration planning on 210 acres that has occurred to date.

Table 4. HCP Permit Term Average Annual Costs for Cooperative-managed HMAs (HCP Table 9-3) and Average Annual Costs under an HMP

Cost Category	Average Annual Cost - HCP (incl. capital & operational)					Average Annual Cost - HMP (incl. monitoring)				
	County	Marina	MPC	MPRPD	Total	County	Marina	MPC	MPRPD	Total
Program Administration*	\$399,805	\$49,976	\$44,978	\$4,998	\$499,757	\$185,786	\$102,156	\$101,258	\$95,664	\$484,864
Habitat Restoration**	\$4,263	\$533	\$480	\$53	\$5,329	\$0	\$0	\$0	\$0	\$0
HMA Management and Maintenance***	\$313,809	\$39,226	\$35,304	\$3,923	\$392,262	\$1,342,690	\$157,501	\$344,652	\$129,047	\$1,973,890
Contingency and Remedial Measures	\$141,364	\$17,671	\$15,904	\$1,767	\$176,706	\$0	\$0	\$0	\$0	\$0
Total Costs	\$859,243	\$107,405	\$96,665	\$10,741	\$1,074,054	\$1,528,476	\$259,657	\$445,910	\$224,711	\$2,458,754

* Program Administration - Capital Costs from Table 2 plus Project Management & Annual Reporting

**HMP habitat restoration costs are included as start-up costs in Table 4

*** HCP cost does not include HCP which is covered by Cooperative. HMP cost includes monitoring

▶ HMP Implementation Cost Estimates

Development Parcels

- **Costs harder to estimate**
- **Fewer Borderland tasks with costs in HCP cost model**
- **Less known about what will be done under HMP**

Table 5. Jurisdictions with Development Parcels - Start-up Cost

	Jurisdictions				
	Peninsula College	Del Rey Oaks	Seaside	City of Monterey	CSUMB
HMP Responsibilities					
Develop/arrange for management and conservation in consultation with BLM	\$0 - included in HMA management	\$30,000	\$30,000	\$30,000	\$30,000
Vehicle Access control	\$147,782				
Total	\$147,782	\$30,000	\$30,000	\$30,000	\$30,000

Table 6. Jurisdictions with Development Parcels - Average Annual Cost

Jurisdiction	Jurisdiction				
	Peninsula College	Del Rey Oaks	Seaside	City of Monterey	CSUMB
Size (ac)	335	206	423	31	333
Interface with FONM (linear feet)	20,290	6,260	14,740	0	2,617
HMP Responsibilities					
Non-native species control	\$11,390	\$7,004	\$14,382	\$1,054	\$11,322
Fuel breaks – construct and maintain	\$91,305	\$28,170	\$66,330	\$0	\$11,777
Vehicle access control	\$55,200				
Status reports for borderlands	\$12,000	\$12,000	\$12,000	\$0	\$12,000
Erosion control	\$15,351	\$5,766	\$11,559	\$0	\$3,277
HMP - Line item Total Annual Cost	\$130,046 - \$185,246*	\$52,940	\$104,271	\$1,054	\$38,376
HCP - Estimated Annual Cost Borderland Management	\$29,510	\$10,872	\$21,744	\$777	\$16,308
*range without and including vehicle access control					

HMP Cost Savings

- **HCP-specific mitigation measures not needed**
- **Fewer annual reporting requirements than HCP**
No:
 - Covered activities
 - Impacts
 - HCP compliance
- **No/lower program administration start-up costs**
Jurisdictions use existing facilities and equipment

HMP Cost Increases

Loss of economies of scale

- **Develop own RMP & negotiates with USFWS, CDFW, BLM**
- **Individual environmental compliance**
- **No shared staffing - in-house and contractor**
 - **CSUMB provides affordable staffing to HCP Cooperative**
- **No shared equipment**

HMP Cost Increases

- **HMP addresses 10 more species than HCP**
More:
 - **Planning**
 - **Monitoring**
 - **Management**
 - **Annual reporting**
- **HMA monitoring responsibilities shift from HCP Cooperative to local jurisdictions**
- **No incidental take permits for habitat management or development activities**

Conclusions

- **Working together saves money**
 - **More efficient for most or all jurisdictions to share habitat management responsibilities under the HMP**
- **Cost savings of implementing HMP as individual jurisdictions not likely to outweigh associated increases**



Questions?

- We can walk you through assumptions and cost estimates for your jurisdiction
 - Update assumptions and estimates ,as needed
- 