## Year 2006/7 Work Plan

## Santa Margarita Watershed Invasive Plant Program The Santa Margarita *Arundo* Control Fund In-lieu Fee Mitigation Program

August 1, 2006

#### Executive summary:

The Army Corps of Engineers has set up an in-lieu fee program for temporary impacts and small permanent impacts (less than 1 acre) to wetlands within the Santa Margarita watershed. The \$47,000 in mitigation fees collected over the past year (as of Aug. 1<sup>st</sup>, 2006) will be used in 2006 to restore riparian habitat by initiating treatments and native re-vegetation on at least 2.35 acres (at \$20,000 per acre bank cost) of tamarisk (salt cedar), *Arundo donax* (giant reed), *Lepidium latifolium* (perennial pepperweed), or re-vegetation of degraded habitat in the Santa Margarita watershed (Maps 1, Table 1). Additionally, areas initially treated in previous years will be re-treated if necessary and portions of the sites may have additional plantings of native trees and shrubs (mulefat, willows, cottonwoods, sycamores, and oaks) if it is determined more re-vegetation would be beneficial.

As specified in the program document, all work will be carried out by the Mission Resource Conservation District directly or through subcontractors.

#### Santa Margarita Watershed 2006 Restoration Areas:

1. Re-vegetation of degraded riparian habitat on Murrieta Creek and its tributaries on property owned by the City of Murrieta: several potential sites (Map 1).

| Santa Margarita |         |              |                | Perennial         | Native   |
|-----------------|---------|--------------|----------------|-------------------|----------|
| Project site    | Acreage | Arundo       | Tamarisk       | pepperweed        | Planting |
| Murrieta Creek  | >2.35   | No           | No             | No                | Yes      |
| Total:          | >2      | 2.35 acres j | possible sites | , 2.35 acres need | led      |

# Native Re-vegetation Process for Both Invasive Plant Treatment Sites and Enhancement of Degraded Riparian Sites:

Native re-vegetation will occur in areas where *Arundo* biomass is reduced or mowed. Degraded sites that have been selected for re-vegetation may be prepared for planting by mowing ruderal weeds and spraying weeds that would compete for water and nutrients. Degraded sites that have illegal access may also be fenced or barriers erected to reduce impacts from vehicles and foot traffic.

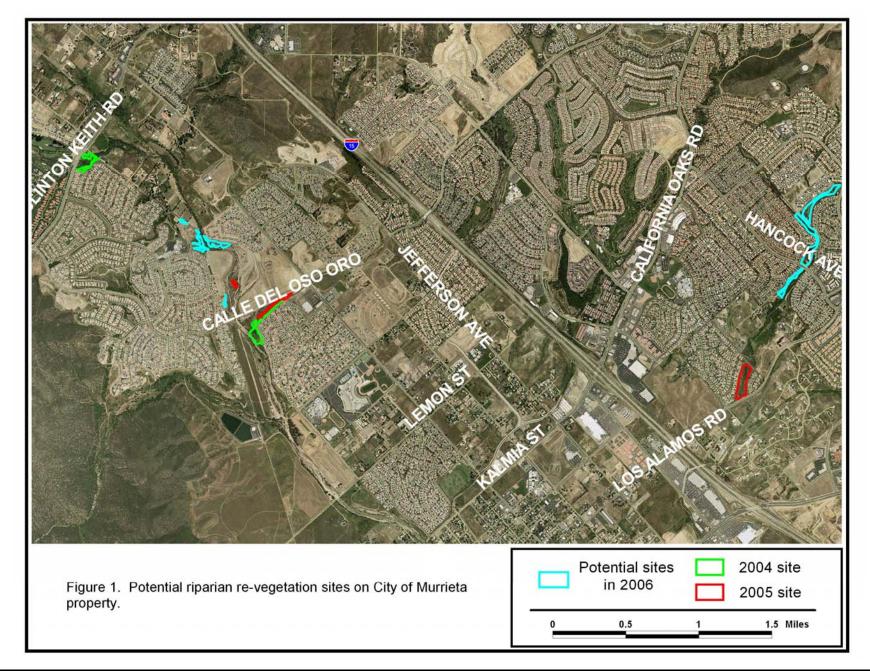
Plantings are 1 gallon container plants of native trees (cottonwood, willows, sycamore, and oak), shrubs (mulefat, toyon, and elderberry), and vines/rhizomatous plants (grape, rose and mugwort). Holes are dug by hand and wells are created around the plants. After planting the plants are watered in by hand and may be watered during the summer. Re-vegetated degraded sites are usually watered once every three to four weeks from June through September. Planting density is 300 plants per acre. The ratio of shrubs, trees and ground cover in open areas is approximately 4:1:1. If pre-existing native tree cover is present on site then the planting pallet consists of only shrub and ground cover species. Additional weed control may occur at sites to allow native plantings time to establish.

#### **Private Landowner Education Program:**

Educational outreach will target landowners that are adjacent to open space where restoration and non-native invasive plant treatments occur. These landowners will receive a "Landowner Handbook", which is a collection of three color pamphlets and four fact sheets with detailed information on *Arundo* and invasive non-native species. A new "Don't Plant A Pest" brochure has been developed for southern CA which identifies invasive non-native plants sold at nurseries and suggests non-invasive alternatives for the home owner. Property owners will also be encouraged to visit the WMA's website at *http://www.smslrwma.org*, where they can obtain more updated and in-depth information on invasive non-native plants and alternatives. Many landowners have already seen newspaper articles on our *Arundo* and perennial pepperweed control efforts that were in the North County Times and the Union Tribune. We will attempt to have more articles in these newspapers as this has been very effective in "getting the word out". MRCD/WMA staff who are knowledgeable about *Arundo* control and other local issues will also talk directly with property owners. This direct interaction is effective in obtaining permission to control the exotic plants present on the landowner's property and answering each person's questions about the project.

#### **Report Schedule:**

2006/7 Monitoring report: due Aug 15<sup>th</sup> 2007 2007/8 Work plan and budget: due Aug 15<sup>th</sup> 2007



## Status of Funding for the Santa Margarita In-Lieu Fee Program as of July 31<sup>st</sup> 2006

#### Year 2000 projects SANTA MARGARITA (\$10,000 per acre)

| MRCD<br>Invoice # | Date of<br>Deposit | Check # | Project Name   | Project/<br>Permit ID  | Acreage        | Amount of deposit   |
|-------------------|--------------------|---------|--|--|----------------|---|
|                   |                    |         | Guava Industrial Park  | 1999-15503-YJC   | 1.00           | \$10,000  |
|                   |                    |         | Santa Gertrudis Creek Bike Trail   | 1999-15104-SDM   | 0.21           | \$10,000  |
|                   |                    |         | SFPP.L.P   | 1-6-99-F54 &<br>1-6-99F-54R2   | 0.40           | \$4,000   |
|                   |                    |         | City of Temecula Sports Park   | 1999-15339YJC  | 1.00           | \$10,000  |
|                   |                    |         | Murrieta Hot Springs Road  | 6-073-00   | 0.50           | \$5,000   |
|                   |                    |         | Murrieta Creek   | 1999-15412-YJC   | 3.00           | \$30,000  |
|                   |                    |         |  | Total:   | 6.11           | \$69,000  |
|                   |                    |         | Year 1 work (in 2000): initial trea<br>Year 2 work (in 2001): re-treatme<br>Year 3 work (in 2002): re-treatme<br>Year 4 work (in 2003): re-treatme<br>Year 5 work (in 2004): re-treatme<br>Year 5 work (in 2004): re-treatme | nts and native plantings<br>nts and native plantings<br>nts and native plantings<br>nts and native plantings |                | \$30,906<br>\$6,257<br>\$8,067<br>\$5,728<br>\$7,220<br>0 |
|                   |                    |         |  | Re   | maining funds: | \$9,322   |
|                   |                    |         | Projected Year 7 work (in 2006):   | re-treatments and nativ  | e plantings    | \$4,000   |

#### Year 2001 projects SANTA MARGARITA (\$10,000 per acre)

| MRCD<br>Invoice # | Date of<br>Deposit | Check # | Project Name   | Project/<br>Permit ID                                | Acreage     | Amount of deposit                         |
|-------------------|--------------------|---------|--|--|-------------|---|
|                   |                    |         | Oleander Ave.  | 2000-1061-YJC  | 0.25        | \$2,500                                   |
|                   |                    |         | Santa Gertrudis Creek  | 2000-002160-SMS                                      | 1.20        | \$12,000                                  |
|                   |                    |         | Tucalota Creek   | 00C-047 (SDCRB)                                      | 1.20        | \$12,000                                  |
|                   |                    |         | City of Murrieta   | 2001-00417-DLC                                       | 0.50        | \$5,000                                   |
|                   |                    |         | Elsinore Homes, Inc.   |  | 0.42        | \$4,200                                   |
|                   |                    |         | <b>BUIE</b> Communities  | 200001129-YJC  | 1.00        | \$10,000                                  |
| <u> </u>          |                    |         | Taylor Henry   | 200101445-DLC  | 0.40        | \$4,000                                   |
|                   |                    |         | Richland Communities   | 200000240-YJC  | 1.0         | \$10,000                                  |
|                   |                    |         | Rancho CA Water District/HELIX   | 002590   | 0.5         | \$5,000                                   |
|                   |                    |         |  | Total:   | 6.47        | \$64,700                                  |
|                   |                    |         | Year 1 work (in 2001): initial treat<br>Year 2 work (in 2002): re-treatmer<br>Year 3 work (in 2003): re-treatmer<br>Year 4 work (in 2004): re-treatmer | nts and native plantings<br>nts and native plantings | gs          | \$31,288<br>\$9,886<br>\$7,642<br>\$3,060 |
|                   |                    |         | Year 5 work (in 2005): re-treatmer   | nts and native plantings                             |             | 0   |
|                   |                    |         |  | Remai  | ning funds: | \$12,823                                  |
|                   |                    |         | Projected Year 5 work (in 2006):   | re-treatments and native                             | plantings   | \$2,000                                   |

#### Year 2002 projects SANTA MARGARITA (\$10,000 per acre)

| MRCD<br>Invoice # | Date of<br>Deposit | Check # | Project Name  | Project/<br>Permit ID                              | Acreage    | Amount of deposit                 |
|-------------------|--------------------|---------|---|--|------------|-----------------------------------|
| ILF # 13          | 4-18-02            |         | MA Temeku Hills Development   | 01C-152  | 0.5        | \$5,000                           |
|                   | 7-31-02            |         | Richmond: Moreno Valley Ranch   | DFG:R6-2002-023                                    | 2.0        | \$20,000                          |
| 27                | 1-22-03            |         | Winchester LLC  | 29707  | 1.0        | \$10,000                          |
| 84                | 7-15-03            |         | DKN Holdings LLC  | 6-2002-039   | 0.5        | \$5,000                           |
|                   |                    |         |   | Total:   | 4.0        | \$40,000                          |
|                   |                    |         | Year 1 work (in 2002): Initial treatment<br>Year 2 work (in 2003): re-treatment<br>Year 3 work (in 2004): re-treatment<br>Year 3 work (in 2005): re-treatment | ts and native plantings<br>ts and native plantings |            | \$22,565<br>\$6,252<br>\$123<br>0 |
|                   |                    |         |   | Remain   | ing funds: | \$11,060                          |
|                   |                    |         | Projected Year 4 work (in 2006): r  | e-treatments and native p                          | lantings   | \$3,500                           |

#### Year 2002 San Luis Rey

| MRCD<br>Invoice # | Date of<br>Deposit | Check # | Project Name  | Project/<br>Permit ID    | Acreage      | Amount of<br>deposit       |
|-------------------|--------------------|---------|---|--------------------------|--------------|----------------------------|
|                   |                    |         | Lilac Elemen. School: Dept of<br>Fish & Game  | SAA#5-095-00             | 0.69         | \$17,250                   |
|                   |                    |         |   | Total:                   | 0.69         | \$17,250                   |
|                   |                    |         | Year 1 work (in 2002): Initial tree<br>Year 2 work (in 2003): re-treatme<br>Year 3 work (in 2004): re-treatme | ents and native planting | s            | \$11,987<br>\$1,862<br>\$0 |
|                   |                    |         | Year 3 work (in 2005): re-treatm  | ents and native planting | S            | \$0                        |
|                   |                    |         |   | Rema                     | ining funds: | \$3,400                    |
|                   |                    |         | Projected Year 4 work (in 2006)   | : re-treatments and nati | ve plantings | \$1,500                    |

### Year 2003 projects SANTA MARGARITA (\$10,000 per acre)

| MRCD<br>Invoice # | Date of<br>Deposit | Check # | Project Name                   | Project/<br>Permit ID          | Acreage         | Amount of deposit |
|-------------------|--------------------|---------|--------------------------------|--------------------------------|-----------------|-------------------|
| 78                | 7-9-03             |         | OTI Oak Hills                  | 6-2003-137                     | 0.4             | \$4,000           |
|                   |                    |         | Pinnacle                       | ACOE: 03C-011                  | 2.0             | \$20,000          |
| 142               | 9-18-02            |         | Ashbrook                       | TM-23435                       | 2.0             | \$20,000          |
| 117               | 11-4-03            |         | Beazer Homes                   | 03c-105                        | 1.0             | \$10,000          |
|                   |                    |         |                                |                                | 5.4             | \$54,000          |
|                   |                    |         | Year 1 work (in 2003): treatm  | ents and native plantings      |                 | \$27,953          |
|                   |                    |         | Year 2 work (in 2004): re-trea | tments and native plantings    |                 | \$20,545          |
|                   |                    |         | Year 3 work (in 2005): re-trea | tments and native plantings    |                 | 0                 |
|                   |                    |         |                                | Remaini                        | ng funds:       | \$5,502           |
|                   |                    |         | Projected Year 3 work          | (in 2006): re-treatments and n | ative plantings | <b>\$0</b>        |

#### 2003 San Luis Rey

| MRCD<br>Invoice # | Date of<br>Deposit | Check # | Project Name  | Project/<br>Permit ID       | Acreage         | Amount of deposit      |
|-------------------|--------------------|---------|---|-----------------------------|-----------------|------------------------|
| 76                | 10-22-03           |         | Lighthouse Ventures LLC   | R5-2002-0100                | 0.2             | \$4,000                |
| 125               | 11-18-03           |         | Heritage Oaks, LLC Strawberry   | 401: #03c-094 &             | 0.5             | \$10,000               |
|                   |                    |         | Fields II   | 404: 200300670-RJL          |                 |                        |
|                   |                    |         |   | Total:                      | 0.7             | \$14,000               |
|                   |                    |         | Year 1 work (in 2003): Initial trea<br>Year 2 work (in 2004): Initial trea<br>Year 3 work (in 2005): Initial trea | atment and native plantings |                 | \$10,695<br>\$0<br>\$0 |
|                   |                    |         |   | Rem                         | aining funds:   | \$3,305                |
|                   |                    |         | Projected Year 3 work (in   | 2005): re-treatments and n  | ative plantings | \$1,000                |

| MRCD<br>Invoice # | Date of<br>deposit | Check #         | Project name                        | Project ID   | Acreage | Amount of deposit |
|-------------------|--------------------|-----------------|-------------------------------------|--|---------|-------------------|
| 135               | 12-31-03           | 388727          | Eastern Municipal Water<br>District | RWQCB 401: 03c-144   | 0.5     | \$10,000          |
| 166               | 2-10-04            | 82479           | Emmanuel Faith Comm Ch              |  | 1.5     | \$30,000          |
| 186               | 3-30-04            | 090785          | City of Temecula                    | RWQCB 401: 03c-058 & ACOE 404:200400719DLC                   | 0.2     | \$4,000           |
| 197               | 3-18-04            | 1232            | Cameo Homes                         | DFG: 2004-5038-R6  | 1.0     | \$20,000          |
| 199               | 4-23-04            | 10088           | Lennar Homes                        | RWQCB 401: 03c-135   | 0.5     | \$10,000          |
| 213               | 4-24-04            | 138             | Cameo Homes                         | DFG: 2003-5119-R6<br>ACOE 404:200400479DPS<br>RWQCB: 03c-149 | 0.5     | \$10,000          |
| 215               | 6-21-04            | 006269          | Esquera Dev LLC                     | DFG: 2004-5033-R6  | 1.0     | \$20,000          |
| 219               | 6-16-04            | 0500444440      | Riverside County Trans Dept         | DFG:   | 1.0     | \$20,000          |
| 228               | 6-10-04            | 1103            | Regency Centers                     | RWQCB 401: 03c-039   | 1.5     | \$30,000          |
| 230               | 6-10-04            | 2384            | Adams Landscape                     | RWQCB 401: 04c-044   | 0.1     | \$2,000           |
| 252               | 8-12-04            | 64070717        | Beazer Homes                        | RWQCB 401: 03c-114   | 1.0     | \$20,000          |
| 257               | 8-11-04            | 5170            | Murrieta Corp Cent                  | DFG: 2004-0058-R6  | 2.0     | \$40,000          |
| 263               | 8-10-04            | 001022          | Pinnacle: Highpoint<br>Communities  | DFG: 6-2003-079  | 1.0     | \$20,000          |
|                   |                    |                 |                                     |  | 11.8    | \$236,000         |
| Year 1 woi        | rk (in 2004        | ): Treatments a | and native plantings                |  |         | \$103,880         |
|                   |                    | ,               | e and native plantings              |  |         | \$45,283          |
|                   |                    |                 | <b>Remaining funds:</b>             |  |         | \$86,837          |
| Projected `       | Year 3 woi         | rk (in 2006): N | faintenance and native plantings    |  |         | \$12,000          |

#### Year 2004 projects SANTA MARGARITA (\$20,000 per acre)

## Year 2005 projects SANTA MARGARITA (\$20,000 per acre)

Deposits made into county account, draft information

| MRCD<br>Invoice # | Date of<br>deposit | Check #         | Project name                    | Project ID             | Acreage | Amount of deposit |
|-------------------|--------------------|-----------------|---------------------------------|------------------------|---------|-------------------|
| 269               | 10-26-04           | 0500532200      | Riverside County Tr (part 1)    | DFG:2003-5069-R6       | 0.275   | 5,500.00          |
| 472               |                    |                 | Riverside County Tr (part 2)    | DFG:2003-5069-R6       | 0.225   | 4,500.00          |
| 303               | 12-15-04           | 1236            | Tera Cor                        | DFG: 2004-0029-R6      | 0.240   | 4,800.00          |
| 305               | 12-28-04           | 1018            | Steve Adams                     | DFG: 1600-2004-0108-R6 | 0.060   | 1,200.00          |
| 322               | 2-9-05             | 26              | Helix for Paul Garrett          | RWQCB: 401-04c-069     | 0.200   | 4,000.00          |
| 327               | 3-7-05             | 2405            | Helix for Heritage Oaks         | RWQCB: 401-04c-069     | 1.000   | 20,000.00         |
| 248               | 7-14-04            | 3000234         | Warm Springs Investment         | RWQCB: 401-04C-041     | 0.500   | 10,000.00         |
| 268               | 9-21-04            | 094272          | City of Temecula                | RWQCB: 401-03C-011     | 0.797   | 15,940.00         |
| 356               | 6-22-05            | 2389-54428      | City of Murrieta                | ACOE: 2001-004-17-SMJ  | 2.000   | 40,000.00         |
| 470               | 10-26-05           | 18224           | Helix for Vinyards view east    | RWQCB: 401-05c-071     | 0.040   | 800.00            |
| 469               | 10-27-05           | 1371            | Cassatt Academy                 | RWQCB: ?               | 0.033   | 660.00            |
| 442               | 8-9-05             | 0500727919      | Riverside County Trans          | RWQCB: 05c-036         | 0.150   | 3,000.00          |
| 430               | 8-24-05            | 369615          | MWD                             | RWQCB: 05c-040         | 0.050   | 1,000.00          |
| 426               | 8-15-05            | 07318           | Ryland Homes                    | ACOE: 2000-01577-DRS   | 1.500   | 30,000.00         |
| 473               | 12-6-04            | 445             | BEG LLC                         | ACOE: 950012100-DLC    | 0.100   | 2,000.00          |
|                   |                    |                 |                                 |                        | 7.17    | \$167,400         |
| Year 1 woi        | rk (in 2005        | ): Treatments a | and native plantings            |                        |         | \$97,127.73       |
|                   |                    |                 | Remaining fund                  | s:                     |         | \$70,272.27       |
| Projecte          | ed Year 2 v        | vork (in 2006)  | Maintenance and native planting | gs                     |         | \$35,000          |

## 2005 San Luis Rey (\$20,000 per acre)

| MRCD<br>Invoice #  | Date of<br>deposit | Check #            | Project name                  | Project ID             | Acreage   | Amount of deposit |
|--------------------|--------------------|--------------------|-------------------------------|------------------------|-----------|-------------------|
| 449                | 9-7-05             | 1015668            | Richland                      | DFG: 5-492-98          | 0.4       | 8,000             |
| 330                | 4-4-05             | 76141246           | Palomar Community             | DFG: 1600-2004-0422-R5 | 0.2       | 4,000             |
| 345                | 4-26-05            | 65902              | Vallecitos Water District     | DFG: 1600-2004-0402-R5 | 1.0       | 20,000            |
|                    |                    | 167                | Amtrak                        | RWQCB 401: 03c-108     | 0.03      | 600               |
|                    |                    |                    |                               |                        | 1.63      | \$32,600          |
| Projected Y        | <br>Year 1 wor     | <br>k (in 2005): T | reatments and native planting | S                      |           | \$14,940          |
|                    |                    |                    |                               | Remainin               | ng funds: | \$17,660          |
| <b>Projected</b> Y | Year 2 wor         | k (in 2006): N     | Antenance and native plantin  | gs                     |           | \$8,000\$         |

### Year 2006 projects SANTA MARGARITA (\$20,000 per acre)

Deposits made into county account, draft information

| Invoice # | Date of<br>deposit | Check # | Project name                                      | Project ID        | Acreage | Amount of deposit |
|-----------|--------------------|---------|---|-------------------|---------|-------------------|
| 502 2     | 2-9-06             | 502     | Keystone Comm                                     | DFG: 05-0214-R6   | 0.10    | 2,000             |
| 504 2     | 2-28-06            | 105903  | Lennar Communities:<br>Harveston LLC- Ynez Bridge | DFG: 03-507-81-R6 | 0.25    | 5,000             |
| 509 2     | 2-16-06            | 2320    | Palmilla LLC                                      | RWQCB: R9-05-0259 | 0.50    | 10,000            |
|           | Not<br>payed yet   |         | Murrieta Corp Center                              | DFG: 04-058-R6    | 1.50    | 30,000            |
|           |                    |         |   |                   | 2.35    | \$47,000          |