

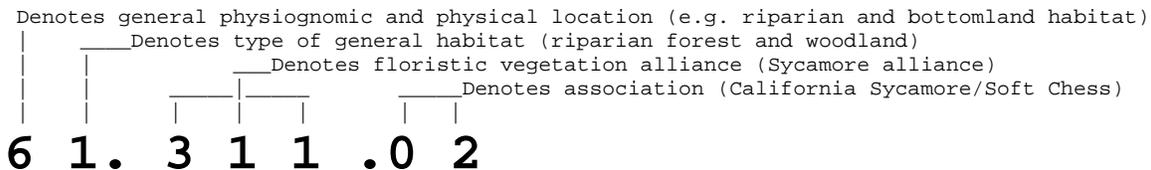
**Department of Fish and Game**  
**Biogeographic Data Branch**  
*The Vegetation Classification and Mapping Program*  
**List of California Terrestrial Natural Communities Recognized by**  
**The California Natural Diversity Database**  
 September 2003 Edition

**Introduction:**

This document supersedes all other lists of terrestrial natural communities developed by the Natural Diversity Database (CNDDDB). It is based on the classification put forth in "A Manual of California Vegetation" (Sawyer and Keeler-Wolf 1995 and upcoming new edition). However, it is structured to be compatible with previous CNDDDB lists (e.g., Holland 1986). For those familiar with the Holland numerical coding system you will see a general similarity in the upper levels of the hierarchy. You will also see a greater detail at the lower levels of the hierarchy. The numbering system has been modified to incorporate this richer detail. Decimal points have been added to separate major groupings and two additional digits have been added to encompass the finest hierarchal detail.

One of the objectives of the Manual of California Vegetation (MCV) was to apply a uniform hierarchical structure to the State's vegetation types. Quantifiable classification rules were established to define the major floristic groups, called alliances and associations in the National Vegetation Classification (Grossman et al. 1998). In this document, the alliance level is denoted in the center triplet of the coding system and the associations in the right hand pair of numbers to the left of the final decimal. The numbers of the alliance in the center triplet attempt to denote relationships in floristic similarity. For example, the Chamise-Eastwood Manzanita alliance (37.106.00) is more closely related to the Chamise-Cupleaf Ceanothus alliance (37.105.00) than it is to the Chaparral Whitethorn alliance (37.205.00). However, due the rigidity of the numerical system newly added alliances are not necessarily numerically adjacent to their closest relatives.

**EXAMPLE OF CODE:**



In portions of this list numbered place-holders have been added. These are not formal units of classification, but simply serve to further clarity relationships between some of the more complex vegetation types. For example, several vegetation alliances are characterized by having Chamise (*Adenostoma fasciculatum*) as a major component. Thus the code 37.100.00 chaparral with Chamise was erected to show that such alliances as 37.105.00 Chamise-Cupleaf Ceanothus, 37.106.00 Chamise-Eastwood Manzanita, etc- are included in this cluster of chaparral types characterized by high cover of chamise. Other examples in this vein are vegetation with pines dominant (87.000.00), vegetation with fir dominant (88.000.00), and vegetation dominated by tree oaks (71.000.00). Because the classification for California is incomplete, the detail in the finest resolution of the hierarchy, the associations, is not uniform. Associations are defined quantitatively through a classification procedure using numerical comparisons between related vegetation sampling plots. These comparisons have been made only for a

portion of all vegetation stands in California. For example the U.S. Forest Service has been active in defining associations. Thus, one will notice the rich detail of the classification in various forest alliances such as the Douglas-fir, Red fir, White fir, and Jeffrey pine.

Since the previous edition of this document large areas of the State including the Mojave Desert, Yosemite National Park, Point Reyes National Seashore, and other National Park lands have been widely sampled through vegetation mapping and classification projects. Identification of these alliances and associations will be possible in the second edition of *The Manual of California Vegetation* expected to be published in 2003. Details about the definitions of more long-established alliances (called series in the first edition), their species composition, distribution, and ecological requirements may be sought in the MCV. (*Available from The California Native Plant Society*)

The literature citations following the association name refer to the original authors who defined the particular association. These are analogous to the author's names following a plant species in a botanical flora. All the citations mentioned in this document prior to 1996 are listed as entered in the literature citations in *The Manual of California Vegetation* or if newly defined, will be cited in the second edition of the MCV.

The primary purpose of the CNDDDB classification is to assist in the location and determinations of significance and rarity of various vegetation types. Thus, ranking of natural communities by their rarity and threat is an important facet of the classification. In this document, as in previous CNDDDB community lists, asterisks (\*) denote communities that are either known or believed to be of high priority for inventory in CNDDDB. If an alliance is starred, this means that all of the associations within it will also be considered of high inventory priority.

A special issue arises as a result of the conversion of the classification. Because CNDDDB has accumulated many location records for certain rare community types now considered differently in the classification, it is very important that this critical conservation information is not lost as a result of taxonomic change. Thus, in this document one will notice instances where a community is listed either at the alliance or association level with an accompanying bracketed number. This number is the Holland code, which was used for it in the older classification. (e.g. 52.100.00 Fresh-Brackish Water Marsh {52200}). Because, in some cases, we are unsure of how this community type relates to the new hierarchy (it has not been quantitatively defined), it is placed into the hierarchy in its most likely position. However, no information will be lost and it will continue to be maintained in CNDDDB until all occurrences of the community can be properly placed into the quantitative hierarchy. This fact points to the need for assistance from field investigators to revisit these sites and provide information on the species cover so we can convert to the new classification.

As more information comes in on the relationships between associations in this classification it becomes clear where some of these should be placed in the classification. For example the concept of the montane or Sierra mixed conifer forest has been vastly altered as a result of cumulative analysis of data of many plots of montane coniferous forest throughout California. Thus, in this list you will note that many of the mixed conifer associations in the previous edition of this document have been moved to White fir-Douglas-fir, Douglas-fir – Canyon Live Oak, Douglas-fir – Incense-cedar Forest, White-fir – Sugar Pine, Ponderosa Pine- Incense Cedar, and other newly defined alliances that better describe the variation in the montane coniferous forests of the state. Vegetation classification is an active field in California and such relationships will continue to be refined for some time. Currently we define approximately 400 alliances and 1300 associations.

We *relish* information on communities, whether it is a new record or re-assessment of existing information. Please contact us at CNDDDB (916) 324-6857, and we can help you determine the most useful way to collect information on communities.

VEGETATION CLASSIFICATION: TERRESTRIAL SECTION (\*indicates a series or association considered rare and worthy of consideration by CNDDDB) September 2003

20.000.00 DUNES

21.000.00 Coastal Dunes

21.010.00 Active Coastal Dunes {21100}

21.020.00 Coastal Foredunes {21200}

21.030.00 Central Foredunes {21220}

21.040.00 Southern Foredunes {21230}

\*21.100.00 Sand-verbena-Beach Bursage [*Abronia villosa*-*Ambrosia chamissonis*] {21210}

\*21.100.01 Beach Morning Glory - Dune Sagebrush [*Calystegia soldanella*- *Artemisia pycnocephala*] (Bluestone 1981)

\*21.100.02 Seashore Bluegrass - Dune Sagebrush [*Poa douglasii*- *Artemisia pycnocephala*] (Duebendorfer 1989)

\*21.100.03 Beach Bursage-Seaside Woolly-sunflower-Yellow Bush Lupine [*Ambrosia chamissonis*-*Eriophyllum staechadifolium*-*Lupinus arboreus*] (Holton & Johnson 1979)

\*21.100.04 Seaside Woolly-sunflower - Yellow Bush Lupine [*Eriophyllum staechadifolium*-*Lupinus arboreus*] (Holton & Johnson 1979)

\*21.100.05 Active North Coastal Dunes (Johnson 1963)

\*21.100.06 Seashore Bluegrass - Beach Pea [*Poa douglasii*-*Lathyrus littoralis*] (Parker 1974 & Johnson 1977)

\*21.100.07 Strand (Williams & Potter 1972)

\*21.100.08 Northern Dune Scrub {21310}

\*21.100.09 Central Dune Scrub {21320}

\*21.100.10 Southern Dune Scrub {21330}

\*21.110.00 Beach Bursage [*Ambrosia chamissonis*] (Keeler-Wolf, *et al.* 2001)

\*21.110.01 Dune Sagebrush - sandmat [*Artemisia pycnocephala*- *Cardionema ramosissimum*](Keeler-Wolf, *et al.* 2001)

21.200.00 Non-native Iceplant

21.200.01 Iceplant - Fig-marigold [*Mesembryanthemum* spp.- *Carpobrotus* spp.] (Keeler-Wolf, *et al.* 2001)

22.000.00 Cismontane and Desert Interior Dunes

\*22.010.00 Active Desert Dunes and Sand Fields {22000}

\*22.100.00 Desert Sand-verbena [*Abronia villosa*]

\*22.200.00 Antioch Dunes Unique Stands {23100}

22.300.00 Stabilized and Partially Stabilized Desert Dunes {22200}

22.400.00 Stabilized and Partially Stabilized Desert Sand Fields {22300}

\*22.500.00 San Joaquin Valley Dunes (residual dunes of Holland)

30.000.00 SCRUB AND CHAPARRAL

31.000.00 Coastal Bluff Scrub {31000}

\*31.100.00 Northern Coastal Bluff Scrub {31100}

\*31.200.00 Southern Coastal Bluff Scrub {31200}

32.000.00 Coastal Scrub {32000}

32.005.00 Riversidian Sage Scrub {32700}

32.005.01 Upland Riversidian Sage Scrub {32710}

\*32.005.02 Riversidian Alluvial Fan Sage Scrub {32720}

32.005.03 Riversidian Desert Scrub

32.010.00 California Sagebrush Scrub [*Artemisia californica*]

32.010.01 California Sagebrush [*Artemisia californica*] (Kirkpatrick & Hutchinson 1977, Gordon & White 1994)

32.010.02 California Sagebrush - Deer Weed [*Artemisia californica-Lotus scoparius*] (DeSimone & Burk 1992)

32.010.03 California Sagebrush - Bush Penstemon [*Artemisia californica-Keckiella cordifolia*] (Gordon & White 1994)

32.010.04 California Sagebrush - Purple Sage [*Artemisia californica-Salvia leucophylla*] (Gordon & White 1994)

32.020.00 Black Sage Scrub [*Salvia mellifera*]

32.020.01 Black Sage - Laurel Sumac [*Salvia mellifera-Malosma laurina*] (Kirkpatrick & Hutchinson 1977)

32.020.02 Black Sage - California Buckwheat [*Salvia mellifera-Eriogonum fasciculatum*] (Kirkpatrick & Hutchinson 1977)

32.020.03 Black Sage [*Salvia mellifera*] (Malanson 1984)

32.020.04 Black Sage - California Encelia [*Salvia mellifera-Encelia californica*] (Malanson 1984)

\*32.020.05 Black Sage - Coast Prickly-pear [*Salvia mellifera-Opuntia littoralis* and hybrids] (Mooney 1977)

\*32.030.00 White Sage Scrub [*Salvia apiana*]

32.040.00 California Buckwheat Scrub [*Eriogonum fasciculatum*]

32.040.01 California Buckwheat - California Figwort - Phacelia [*Eriogonum fasciculatum-Scrophularia californica-Phacelia ramosissima*] (Kirkpatrick & Hutchinson 1977)

32.040.02 California Buckwheat [*Eriogonum fasciculatum*] (Gordon & White 1994)

\*32.040.03 California Buckwheat - Big Sagebrush [*Eriogonum fasciculatum-Artemisia tridentata*] (Gordon & White 1994)

\*32.040.04 California Buckwheat Alluvial Fan [*Eriogonum fasciculatum*] (Gordon & White 1994)

32.040.05 California Buckwheat-White Bursage [*Eriogonum fasciculatum-Ambrosia dumosa*] (Keeler-Wolf *et al* 1998)

32.040.06 California Buckwheat - Bladder Sage [*Eriogonum fasciculatum-Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)

\*32.041.00 Wright's Buckwheat Dwarf Scrub [*Eriogonum wrightii*] (Keeler-Wolf *et al* 1998)

\*32.050.00 California Encelia Scrub [*Encelia californica*]

32.050.01 California Encelia - California Sagebrush [*Encelia californica-Artemisia californica*] (Kirkpatrick & Hutchinson 1977)

\*32.050.02 California Encelia [*Encelia californica*] (Malanson 1984)

32.060.00 Coyote Brush Scrub and Dwarf Scrub [*Baccharis pilularis*] {32110}

- \*32.060.01 Coyote Brush/Seaside Woolly-sunflower [*Baccharis pilularis/Eriophyllum staechnadifolium*] (Baxter 1992)
- \*32.060.02 Coyote Brush / Tufted Hairgrass [*Baccharis pilularis/Deschampsia caespitosa*] (Elliott & Wehausen 1974)
- \*32.060.03 Coyote Brush / Creeping Ryegrass [*Baccharis pilularis/Leymus triticoides*] (Fiedler & Leidy 1987)
- \*32.060.04 Coyote Brush / Sword Fern [*Baccharis pilularis/Polystichum munitum*] (Grams *et al.* 1977)
- 32.060.05 Coyote Brush - California Sagebrush [*Baccharis pilularis-Artemisia californica*] (Heady *et al.* 1977)
- 32.060.06 Coyote Brush – Dune Lupine -Yellow Bush Lupine [*Baccharis pilularis-Lupinus chamissonis – Lupinus arboreus*] (Parker 1974 in Barbour & Johnson 1977 modified by Keeler-Wolf *et al.* 2001)
- 32.060.07 Coyote Brush / European Beachgrass [*Baccharis pilularis/Ammophila arenaria*] (Parker 1974 in Barbour & Johnson 1977)
- 32.060.08 Coyote Brush / California Figwort [*Baccharis pilularis/Scrophularia californica*] (Parker 1974 in Barbour & Johnson 1977)
- 32.060.09 Coyote Brush / Annual Grasses [*Baccharis pilularis-Bromus spp.*] (Keeler-Wolf, *et al.* 2001)
- \*32.060.10 Coyote Brush / Purple Needlegrass [*Baccharis pilularis /Nassella pulchra*] (Keeler-Wolf, *et al.* 2001)
- \*32.060.11 Coyote Brush / California Oatgrass [*Baccharis pilularis /Danthonia californica*] (Keeler-Wolf, *et al.* 2001)
- \*32.060.12 Coyote Brush / Ocean Spray [*Baccharis pilularis /Holodiscus discolor*] (Keeler-Wolf *et al.* 2001)
- \*32.060.13 Coyote Brush / Slough Sedge – Common Rush [*Baccharis pilularis /Carex obnupta - Juncus patens*] (Keeler-Wolf *et al.* 2001)
- 32.060.14 Coyote Brush – Blueblossom [*Baccharis pilularis – Ceanothus thyrsiflorus*] (Keeler-Wolf *et al.* 2001)
- 32.060.15 Coyote Brush – California Blackberry/ Weedy herb [ *Baccharis pilularis -Rubus ursinus/weedy herb*] (Keeler-Wolf *et al.* 2001)
- 32.060.16 Coyote Brush – Coffeeberry [*Baccharis pilularis -Rhamnus californicus*] (Keeler-Wolf *et al.* 2001)
- 32.060.17 Coyote Brush – Poison Oak [*Baccharis pilularis -Toxicodendron diversilobum*] (Keeler-Wolf *et al.* 2001)
- 32.060.18 Coyote Brush – California Sagebrush – Poison Oak/ Coyotemint [*Baccharis pilularis - Artemisia californica-Toxicodendron/Monardella villosa*] (Keeler-Wolf *et al.* 2001)
  
- \*32.070.00 Scalebroom Scrub [*Lepidospartum squamatum*] (Keeler-Wolf *et al.* 1998)
- \*32.070.01 California Buckwheat - Scalebroom [*Eriogonum fasciculatum-Lepidospartum squamatum*] (Gordon & White 1994)
- \*32.070.02 Scalebroom - Hairy Yerba Santa - Chaparral Yucca [*Lepidospartum squamatum-Eriodictyon crassifolium-Yucca whipplei*] (Kirkpatrick & Hutchinson 1977)
- \*32.070.03 Scalebroom / mixed ephemeral herbs [*Lepidospartum/mixed ephemeral Mojave Desert*], (Barbour & Wirka 1997)
  
- 32.080.00 Yellow Bush Lupine Scrub [*Lupinus arboreus*]
- 32.080.01 Yellow Bush Lupine - Rippgut Brome [*Lupinus arboreus-Bromus diandrus*] (Duebendorfer 1989)
- 32.080.02 Yellow Bush Lupine [*Lupinus arboreus*] (Holton & Johnson 1979)
- \*32.080.03 Yellow Bush Lupine-Heather Goldenbush [*Lupinus arboreus-Ericameria ericoides*] (Holton & Johnson 1979)
- 32.080.04 Yellow Bush Lupine - Vernal Grass [*Lupinus arboreus-Anthoxanthum odoratum*] (Hektner & Foin 1977)
- 32.080.05 Yellow Bush Lupine - California Figwort [*Lupinus arboreus-Scrophularia californica*] (Parker 1974)

- 32.081.00 Silver Bush Lupine Scrub [*Lupinus albifrons*] (Keeler-Wolf and Moore 2001)
  - 32.081.01 Silver Bush Lupine [*Lupinus albifrons*] (Keeler-Wolf and Moore 2001)
- 32.090.00 Purple Sage Scrub [*Salvia leucophylla*]
  - 32.090.01 Purple Sage - California Sagebrush [*Salvia leucophylla-Artemisia californica*] (Kirkpatrick & Hutchinson 1977)
  - 32.090.02 Purple Sage - Laurel Sumac [*Salvia leucophylla-Malosma laurina*] (Kirkpatrick & Hutchinson 1977)
- \*32.100.00 California Buckwheat - White Sage Scrub [*Eriogonium fasciculatum-Salvia apiana*] (Gordon & White 1994)
  - \*32.100.01 California Buckwheat - White Sage [*Eriogonium fasciculatum-Salvia apiana*] (Gordon & White 1994)
- 32.110.00 California Sagebrush - California Buckwheat Scrub [*Artemisia californica-Eriogonium fasciculatum*]
  - 32.110.01 California Sagebrush - California Buckwheat - Sugar Bush [*Artemisia californica-Eriogonium fasciculatum-Rhus ovata*] (Gordon & White 1994)
  - 32.110.02 California Sagebrush - California Buckwheat - White Sage [*Artemisia californica-Eriogonium fasciculatum-Salvia apiana*] (Gordon & White 1994)
- 32.120.00 California Sagebrush - Black Sage Scrub [*Artemisia californica-Salvia mellifera*]
  - 32.120.01 California Sagebrush - Black Sage [*Artemisia californica-Salvia mellifera*] (DeSimone & Burk 1992)
  - 32.120.02 Black Sage - California Sagebrush [*Salvia mellifera-Artemisia californica*] (DeSimone & Burk 1992)
- \*32.130.00 Salal - Black Huckleberry Scrub and Dwarf Scrub [*Gaultheria shallon-Vaccinium ovatum*] {32120}
- 32.140.00 Mixed Sage Scrub [*Salvia* spp.]
- \*32.150.00 Coast Prickly Pear Succulent Scrub [*Opuntia littoralis*]
- \*32.160.00 Dune Lupine - Goldenbush Scrub [*Lupinus chamissonis-Isocoma menziesii*] {21330}
  - \*32.160.01 Heather Goldenbush [*Ericameria ericoides*] (Bluestone 1981)
  - \*32.160.02 Dune Lupine [*Lupinus chamissonis*] (Holton & Johnson 1979)
  - \*32.160.03 Dune Lupine - Heather Goldenbush [*Lupinus chamissonis-Ericameria ericoides*] (Holton & Johnson 1979)
- \*32.170.00 Maritime Succulent Scrub {32400}
- 32.180.00 Broom Scrub [includes stands of *Cytisus* spp., *Spartium* spp., *Genista* spp.]
- 32.185.00 Gorse Scrub [*Ulex europea*] (Keeler-Wolf, et al. 2001)
- 32.190.00 Venturan Coastal Sage Scrub {32300}
- 32.200.00 Diegan Coastal Sage Scrub {32500}
- 32.300.00 Coastal Sage Chaparral Scrub {37G00}
- 33.000.00 Sonoran and Mojavean Desert Scrub
  - 33.010.00 Creosote Bush Scrub [*Larrea tridentata*] {33100}
    - 33.010.01 Creosote Bush with disturbance [*Larrea tridentata*] (Minnich et al. 1993)

- \*33.010.02 Sonoran Dune Scrub (Spolsky 1979)
- 33.010.03 High Diversity Creosote Scrub (Spolsky 1979)
- 33.010.04 moved to within 33.027.00
- \*33.010.05 Saltbush - Creosote Bush [*Larrea tridentata-Atriplex polycarpa*] (Spolsky 1979)
- 33.010.06 Creosote Bush Wash Scrub [*Larrea tridentata*] (Keeler-Wolf *et al.* 1998)
- \*33.010.07 Creosote Bush-White Ratteny-Big Galleta [*Larrea tridentata-Krameria grayi-Pleuraphis rigida*] (Keeler-Wolf *et al.* 1998)
- 33.010.08 Creosote Bush - Cheesebush [*Larrea tridentata-Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
- 33.010.09 Creosote Bush / Desert Trumpet [*Larrea tridentata/Eriogonum inflatum*] (Keeler-Wolf and Thomas 2000)
- 33.010.10 Creosote Bush - Nevada Ephedra [*Larrea tridentata-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
- \*33.010.11 Creosote Bush - Mojave Yucca - Desert Tea [*Larrea tridentata-Yucca schidigera-Ephedra californica*] (Keeler-Wolf and Thomas 2000)
- 33.010.12 Creosote Bush - Allscale [*Larrea tridentata-Atriplex polycarpa*] (Keeler-Wolf and Thomas 2000)
- \*33.010.13 Creosote Bush - Big Galleta [*Larrea tridentata-Pleuraphis rigida*] (Keeler-Wolf and Thomas 2000)
- \*33.010.14 Creosote Bush - Big Galleta - Anderson's Wolfberry [*Larrea tridentata-Pleuraphis rigida-Lycium andersonii*] (Keeler-Wolf and Thomas 2000)
- 33.010.15 Creosote Bush - Cheesebush - Woolly Brickellia [*Larrea tridentata-Hymenoclea salsola-Brickellia incana*] (Keeler-Wolf and Thomas 2000)
- 33.010.16 Creosote Bush - Desert-holly [*Larrea tridentata-Atriplex hymenelytra*] (Keeler-Wolf and Thomas 2000)
- 33.010.17 Creosote Bush - Shadscale [*Larrea tridentata-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
- \*33.010.18 Creosote Bush - Shockley's Goldenhead [*Larrea tridentata-Acamptopappus shockleyi*] (Keeler-Wolf and Thomas 2000)
  
- 33.020.00 Blackbush High Desert Scrub [*Coleogyne ramosissima*] {34300}
- \*33.020.01 Sonoran Blackbush [*Coleogyne ramosissima*] (Spolsky 1979)
- 33.020.02 Blackbush - Shadscale [*Coleogyne ramosissima-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
- 33.020.03 Blackbush - Nevada Ephedra [*Coleogyne ramosissima-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
- 33.020.04 Blackbush - Nevada Ephedra - California Buckwheat [*Coleogyne ramosissima-Ephedra nevadensis-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
- 33.020.05 Blackbush - California Buckwheat [*Coleogyne ramosissima-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
- 33.020.06 Blackbush - Creosote Bush - California Buckwheat [*Coleogyne ramosissima-Larrea tridentata-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
- 33.020.07 Blackbush - Creosote Bush - White Busage [*Coleogyne ramosissima-Larrea tridentata-Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
- 33.020.08 Blackbush - Anderson's Wolfberry [*Coleogyne ramosissima-Lycium andersonii*] (Keeler-Wolf and Thomas 2000)
- 33.020.09 Blackbush - Bladder Sage [*Coleogyne ramosissima-Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
  
- 33.025.00 Virgin River Encelia Scrub [*Encelia virginensis* var. *actonii*] (Keeler-Wolf and Thomas 2000)
- 33.025.01 Virgin River Encelia [*Encelia virginensis* var. *actonii*] (Keeler-Wolf and Thomas 2000)
- 33.025.02 Virgin River Encelia - Blue Sage [*Encelia virginensis* var. *actonii-Salvia dorrii*] (Keeler-Wolf and Thomas 2000)
  
- 33.027.00 Creosote Bush - Brittlebush Scrub [*Larrea tridentata-Encelia farinosa*] (Keeler-Wolf and Thomas 2000) Includes former 33.010.04 Creosote Bush - Brittlebush [*Larrea tridentata-Encelia farinosa*] (Spolsky 1979)

- 33.027.01 Creosote Bush - Brittlebush / Arizona Honeysweet [*Larrea tridentata-Encelia farinosa/Tidestromia oblongifolia*] (Keeler-Wolf and Thomas 2000)
- 33.027.02 Creosote Bush - Brittlebush - Sweetbush [*Larrea tridentata-Encelia farinosa-Bebbia juncea*] (Keeler-Wolf and Thomas 2000)
- 33.027.03 Creosote Bush - Brittlebush - White Bursage [*Larrea tridentata-Encelia farinosa-Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
- 33.027.04 Creosote Bush - Brittlebush - Ocotillo [*Larrea tridentata-Encelia farinosa-Fouquieria splendens*] (Keeler-Wolf 2001)
  
- 33.030.00 Brittlebush Drought Deciduous Scrub [*Encelia farinosa*]
- 33.030.01 Brittlebush-succulent scrub [*Encelia farinosa-succulent*]
- \*33.030.02 Brittlebush-Desert Fir [*Encelia farinosa-Peucephyllum schottii*] (Keeler-Wolf *et al.* 1998)
- \*33.030.03 Brittlebush-California Buckwheat-Agave [*Encelia farinosa-Eriogonum fasciculatum-Agave deserti*] (Keeler-Wolf *et al.* 1998)
  
- \*33.031.00 Acton Encelia [*Encelia actoni*]
  
- 33.032.00 Desert Sunflower Drought Deciduous Scrub [*Viguiera parishii*] (Keeler-Wolf *et al.* 1998)
- \*33.032.01 Desert Sunflower-Agave [*Viguiera parishii-Agave deserti*] (Keeler-Wolf *et al.* 1998)
- 33.032.02 Desert Sunflower-California Buckwheat [*Viguiera parishii-Eriogonum fasciculatum*] (Keeler-Wolf *et al.* 1998)
  
- \*33.033.00 Net-veined Viguiera Scrub [*Viguiera reticulata*] (Keeler-Wolf and Thomas 2000)
- \*33.033.01 Net-veined Viguiera [*Viguiera reticulata*] (Keeler-Wolf and Thomas 2000)
  
- 33.040.00 Catclaw Acacia Thorn Scrub [*Acacia greggii*]
- 33.040.01 Catclaw Acacia-wash association [*Acacia greggii*] (Keeler-Wolf *et al.* 1998)
- 33.040.02 Catclaw Acacia Savanna [*Acacia greggii-Bromus madritensis*] (Keeler-Wolf *et al.* 1998)
- 33.040.03 Catclaw Acacia / Desert Lavender [*Acacia greggii-Hyptis emoryi*] (Keeler-Wolf and Thomas 2000)
- 33.040.04 Catclaw Acacia / Cheesebush [*Acacia greggii/Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
- 33.040.05 Catclaw Acacia - Cheesebush - Virgin River Encelia [*Acacia greggii-Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
- 33.040.06 Catclaw Acacia - Desert Sunflower [*Acacia greggii-Viguiera parishii*] (Keeler-Wolf and Thomas 2000)
- 33.040.07 Catclaw Acacia - Desert Almond [*Acacia greggii-Prunus fasciculatum*] (Keeler-Wolf and Thomas 2000)
- \*33.040.08 Catclaw Acacia - Woolly Bursage [*Acacia greggii-Ambrosia eriocentra*] (Keeler-Wolf and Thomas 2000)
- 33.040.09 Catclaw Acacia - Blue Sage [*Acacia greggii-Salvia dorrii*] (Keeler-Wolf and Thomas 2000)
- 33.040.10 Catclaw Acacia - Sweetbush [*Acacia greggii-Bebbia juncea*] (Keeler-Wolf 2001)
- \*33.040.11 Catclaw Acacia/Naked buckwheat [*Acacia greggii/Eriogonum nudum var. pauciflorum*] (Wirka and Barbour 1997)
  
- \*33.050.00 Teddy-bear Cholla Succulent Scrub [*Opuntia bigelovii*]
  
- 33.060.00 White Bursage Dwarf Scrub [*Ambrosia dumosa*]
- \*33.060.01 White Bursage -Rayless Goldenhead [*Ambrosia dumosa -Acamptopappus sphaerocephalus*] association (Keeler-Wolf *et al.* 1998)
- \*33.060.02 White Bursage [*Ambrosia dumosa*], terrace association (Keeler-Wolf *et al.* 1998)
- 33.060.03 White Bursage - Desert-holly [*Ambrosia dumosa-Atriplex hymenolytra*] (Keeler-Wolf and Thomas 2000)

- \*33.060.04 White Bursage - Big Galleta [*Ambrosia dumosa-Pleuraphis rigida*] (Keeler-Wolf 2001)
- 33.060.05 White Bursage - California Buckwheat [*Ambrosia dumosa-Eriogonum fasciculatum*] (Keeler-Wolf 2001)
- \*33.061.00 moved to 33.140.41
- \*33.062.00 Wand Holdback Unique Stands [*Caesalpinia virgata*]
- 33.070.00 Mojave Yucca Scrub [*Yucca schidigera*]
  - 33.070.01 Mojave Yucca [*Yucca schidigera*] (Keeler-Wolf and Thomas 2000)
  - 33.070.02 Mojave Yucca - Blackbush [*Yucca schidigera-Coleogyne ramosissima*] (Keeler-Wolf and Thomas 2000)
  - 33.070.02 Mojave Yucca - Nevada Ephedra [*Yucca schidigera-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
  - 33.070.03 Mojave Yucca - White Bursage [*Yucca schidigera-Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
  - 33.070.05 Mojave Yucca - Creosote Bush - White Bursage [*Yucca schidigera-Larrea tridentata-Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
  - 33.070.06 Mojave Yucca - Creosote Bush - Nevada Ephedra [*Yucca schidigera-Larrea tridentata-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
  - 33.070.07 Mojave Yucca - California Buckwheat [*Yucca schidigera-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
  - \*33.070.08 Mojave Yucca - Buckhorn Cholla [*Yucca schidigera-Opuntia acanthocarpa*] (Keeler-Wolf and Thomas 2000)
  - 33.070.09 Mojave Yucca - Desert Sunflower [*Yucca schidigera-Viguiera parishii*] (Keeler-Wolf and Thomas 2000)
  - \*33.070.10 Mojave Yucca - Creosote Bush - (Jojoba) [*Yucca schidigera-Larrea tridentata-Simmondsia chinensis*] (Keeler-Wolf and Thomas 2000)
- \*33.075.00 Desert Agave succulent-leaved scrub [*Agave deserti*]
  - \*33.075.01 Desert Agave wash terrace [*Agave deserti*] (Keeler-Wolf et al. 1998)
  - \*33.075.02 Desert Agave-Mojave Yucca [*Agave deserti-Yucca schidigera*] (Keeler-Wolf et al. 1998)
- \*33.080.00 Nolina [*Nolina* spp.]
  - \*33.080.01 Parry's Nolina [*Nolina parryi*] (Keeler-Wolf and Thomas 2000)
- \*33.090.00 Ocotillo open-tall scrub [*Fouquieria splendens*]
- \*33.100.00 All-thorn Tall Scrub Unique Stands [*Koeberlinia spinosa*] {75300}
- \*33.110.00 Crucifixion-thorn Tall Scrub Unique Stands [*Castela emoryi*] {75200}
- \*33.120.00 Elephant Tree Unique Stands [*Bursera microphylla*] {75100}
- 33.130.00 Brittlebush - White Bursage Dwarf Scrub [*Encelia farinosa-Ambrosia dumosa*]
- 33.140.00 Creosote Bush - White Bursage Scrub [*Larrea tridentata-Ambrosia dumosa*]
  - 33.140.01 Rocky sides of hills and mountains (McHargue 1973)
  - 33.140.02 Rocky bajadas (McHargue 1973)
  - 33.140.03 Gravelly bajadas (McHargue 1973)
  - 33.140.04 Sonoran Creosote Bush Scrub [*Larrea tridentata*] (Spolsky 1979){33100}
  - 33.140.05 Uniform Creosote Scrub [*Larrea tridentata*] (Spolsky 1979)
  - 33.140.06 Mojave Creosote Bush Scrub [*Larrea tridentata*] {34100}

- \*33.140.07 Creosote bush-White bursage-Indigo Bush [*Larrea tridentata-Ambrosia dumosa-Psorothamnus schottii*] (Keeler-Wolf *et al.* 1998)
- \*33.140.08 Creosote bush-White bursage-California croton [*Larrea tridentata-Ambrosia dumosa-Croton californica*]
- 33.140.09 Creosote Bush-White Bursage-Desert-holly [*Larrea tridentata-Ambrosia dumosa-Atriplex hymenelytra*] (Keeler-Wolf *et al.* 1998)
- \*33.140.10 Creosote Bush-White Bursage-Galium-Lyrocarpa [*Larrea tridentata-Ambrosia dumosa-Galium angustifolium-Lyrocarpa coulteri*] (Keeler-Wolf *et al.* 1998)
- 33.140.11 Creosote Bush - White Bursage - Mojave Yucca [*Larrea tridentata-Ambrosia dumosa-Yucca schidigera*] (Keeler-Wolf and Thomas 2000)
- 33.140.12 Creosote Bush - White Bursage - Desert Sunflower [*Larrea tridentata-Ambrosia dumosa-Viguiera parishii*] (Keeler-Wolf and Thomas 2000)
- 33.140.13 Creosote Bush - White Bursage - Spiny Senna [*Larrea tridentata-Ambrosia dumosa-Senna armata*] (Keeler-Wolf and Thomas 2000)
- 33.140.14 Creosote Bush - White Bursage - Bladder Sage [*Larrea tridentata-Ambrosia dumosa-Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
- 33.140.15 Creosote Bush - White Bursage - Mojave indigo-bush [*Larrea tridentata-Ambrosia dumosa-Psorothamnus arborescens*] (Keeler-Wolf and Thomas 2000)
- 33.140.16 Creosote Bush - White Bursage - Fremont's indigo-bush [*Larrea tridentata-Ambrosia dumosa-Psorothamnus fremontii*] (Keeler-Wolf and Thomas 2000)
- \*33.140.17 Creosote Bush - White Bursage - Big Galleta [*Larrea tridentata-Ambrosia dumosa-Pleuraphis rigida*] (Keeler-Wolf and Thomas 2000)
- 33.140.18 Creosote Bush - White Bursage - Pencil Cactus [*Larrea tridentata-Ambrosia dumosa-Opuntia ramosissima*] (Keeler-Wolf and Thomas 2000)
- 33.140.19 Creosote Bush - White Bursage - Anderson's Wolfberry [*Larrea tridentata-Ambrosia dumosa-Lycium andersonii*] (Keeler-Wolf and Thomas 2000)
- 33.140.20 Creosote Bush - White Bursage - Nevada Ephedra [*Larrea tridentata-Ambrosia dumosa-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
- 33.140.21 Creosote Bush - White Bursage - Desert Peppergrass [*Larrea tridentata-Ambrosia dumosa-Lepidium fremontii*] (Keeler-Wolf and Thomas 2000)
- 33.140.22 Creosote Bush - White Bursage - White Rhatany [*Larrea tridentata-Ambrosia dumosa-Krameria grayi*] (Keeler-Wolf and Thomas 2000)
- 33.140.23 Creosote Bush - White Bursage Pima Rhatany [*Larrea tridentata-Ambrosia dumosa-Krameria erecta*] (Keeler-Wolf and Thomas 2000)
- \*33.140.24 Creosote Bush - White Bursage - Thurber's Sandpaper Plant [*Larrea tridentata-Ambrosia dumosa-Petalonyx thurberi*] (Keeler-Wolf and Thomas 2000)
- 33.140.25 Creosote Bush - White Bursage - Matchweed spp. [*Larrea tridentata-Ambrosia dumosa-Gutierrezia* spp.] (Keeler-Wolf and Thomas 2000)
- 33.140.26 Creosote Bush - White Bursage - Hop-sage [*Larrea tridentata-Ambrosia dumosa-Grayia spinosa*] (Keeler-Wolf and Thomas 2000)
- 33.140.27 Creosote Bush - White Bursage - Desert Trumpet [*Larrea tridentata-Ambrosia dumosa-Eriogonum inflatum*] (Keeler-Wolf and Thomas 2000)
- 33.140.28 Creosote Bush - White Bursage - California Buckwheat [*Larrea tridentata-Ambrosia dumosa-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
- \*33.140.29 Creosote Bush - White Bursage - Death Valley Ephedra [*Larrea tridentata-Ambrosia dumosa-Ephedra funerea*] (Keeler-Wolf and Thomas 2000)
- \*33.140.30 Creosote Bush - White Bursage - Desert Tea [*Larrea tridentata-Ambrosia dumosa-Ephedra californica*] (Keeler-Wolf and Thomas 2000)
- \*33.140.31 Creosote Bush - White Bursage - Virgin River Encelia [*Larrea tridentata-Ambrosia dumosa-Encelia virginensis*] (Keeler-Wolf and Thomas 2000)
- 33.140.32 Creosote Bush - White Bursage - Brittlebush [*Larrea tridentata-Ambrosia dumosa-Encelia farinosa*] (Keeler-Wolf and Thomas 2000)
- \*33.140.33 Creosote Bush - White Bursage - Barrel Cactus [*Larrea tridentata-Ambrosia dumosa-Echinocactus polycephalus*] (Keeler-Wolf and Thomas 2000)
- \*33.140.34 Creosote Bush - White Bursage - Downy Dalea [*Larrea tridentata-Ambrosia dumosa-Dalea mollissima*] (Keeler-Wolf and Thomas 2000)

- \*33.140.35 Creosote Bush - White Bursage - Cryptogammic crust [*Larrea tridentata-Ambrosia dumosa*-Cryptogammic crust] (Keeler-Wolf and Thomas 2000)
- 33.140.36 Creosote Bush - White Bursage - Sweetbush [*Larrea tridentata-Ambrosia dumosa-Bebbia juncea*] (Keeler-Wolf and Thomas 2000)
- 33.140.37 Creosote Bush - White Bursage - Fourwing Saltbush [*Larrea tridentata-Ambrosia dumosa- Atriplex canescens*] (Keeler-Wolf and Thomas 2000)
- 33.140.38 Creosote Bush - White Bursage -Allscale [*Larrea tridentata-Ambrosia dumosa-Atriplex polycarpa*] (Keeler-Wolf and Thomas 2000)
- 33.140.39 Creosote Bush - White Bursage - Shadscale [*Larrea tridentata-Ambrosia dumosa-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
- 33.140.40 Creosote Bush - White Bursage - Fremont's Chaff-bush [*Larrea tridentata-Ambrosia dumosa-Amhipappus fremontii*] (Keeler-Wolf and Thomas 2000)
  
- 33.140.41 Creosote Bush - White Bursage -Fagonia [*Larrea tridentata-Ambrosia dumosa-Fagonia laevis*] (Keeler-Wolf *et al.* 1998)
  
- \*33.150.00 Foothill Palo Verde - Saguaro Tall Scrub [*Cercidum microphyllum-Carnegia gigantea*] {75400}
  
- 33.160.00 Bladderpod - California Ephedra - Narrowleaf Goldenbush Scrub [*Isomeris arborea-Ephedra californica-Ericameria linearifolia*] {23300}
  
- \*33.160.01 Monvero Dunes Association
  
- \*33.170.00 Joshua Tree Tall Scrub and Open Woodland [*Yucca brevifolia*]
- \*33.170.01 Joshua Tree Woodland [*Yucca brevifolia*] {73000}
- \*33.170.02 Joshua Tree / Blackbush [*Yucca brevifolia-Coleogyne ramosissima*] (Keeler-Wolf and Thomas 2000)
- \*33.170.03 Joshua Tree - California Juniper / Blackbush [*Yucca brevifolia-Juniperus californica/Coleogyne ramosissima*] (Keeler-Wolf 2001)
- \*33.170.04 Joshua Tree / Big Sagebrush - Shadscale [*Yucca brevifolia/Artemisia tridentata-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
- \*33.170.05 Joshua Tree / Creosote Bush - Nevada Ephedra [*Yucca brevifolia/Larrea tridentata-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
- \*33.170.06 Joshua Tree / Buckhorn Cholla [*Yucca brevifolia/Opuntia acanthocarpa*] (Keeler-Wolf and Thomas 2000)
- \*33.170.07 Joshua Tree / Galleta spp. [*Yucca brevifolia/Pleuraphis* sp.] (Keeler-Wolf and Thomas 2000)
- \*33.170.08 Joshua Tree / Anderson's Wolfberry [*Yucca brevifolia/Lycium andersonii*] (Keeler-Wolf and Thomas 2000)
- \*33.170.09 Joshua Tree / Bladder Sage [*Yucca brevifolia/Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
- \*33.170.10 Joshua Tree / Mojave Yucca - Creosote Bush [*Yucca brevifolia/Yucca schidigera-Larrea tridentata*] (Keeler-Wolf and Thomas 2000)
- \*33.170.11 Joshua Tree / Creosote Bush - White Bursage - California Buckwheat [*Yucca brevifolia/Larrea tridentata-Ambrosia dumosa-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
  
- 33.180.00 Hop-sage Scrub [*Grayia spinosa*]
- 33.180.01 Hop-sage [*Grayia spinosa*] (Keeler-Wolf and Thomas 2000)
- 33.180.02 Hop-sage - Shadscale [*Grayia spinosa-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
- 33.180.03 Hop-sage - Creosote Bush [*Grayia spinosa-Larrea tridentata*] (Keeler-Wolf and Thomas 2000)
- 33.180.04 Hop-sage - Anderson's Wolfberry [*Grayia spinosa-Lycium andersonii*] (Keeler-Wolf and Thomas 2000)

- \*33.180.05 Hop-sage - Round-leaved Buckwheat [*Grayia spinosa-Eriogonum ovalifolium*] (Keeler-Wolf and Thomas 2000)
- 33.190.00 Desert Lavender Wash Scrub [*Hyptis emoryi*] (Keeler-Wolf *et al.* 1998)
- 33.200.00 Cheesebush Scrub [*Hymenoclea salsola*]
  - 33.200.01 Cheesebush-wash association [*Hymenoclea salsola*] (Keeler-Wolf *et al.* 1998)
  - 33.200.02 Cheesebush-California Buckwheat [*Hymenoclea salsola-Eriogonum fasciculatum*] (Keeler-Wolf *et al.* 1998)
  - 33.200.03 Cheesebush - Blackstem Rabbitbrush [*Hymenoclea salsola-Chrysothamnus paniculatus*] (Keeler-Wolf and Thomas 2000)
  - 33.200.04 Cheesebush - Shadscale [*Hymenoclea salsola-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
  - 33.200.05 Cheesebush - Sweetbush [*Hymenoclea salsola-Bebbia juncea*] (Keeler-Wolf and Thomas 2000)
  - \*33.200.06 Cheesebush -Woolly Bursage [*Hymenoclea salsola-Ambrosia eriocentra*] (Keeler-Wolf and Thomas 2000)
  - 33.200.07 Cheesebush - Woolly Brickellia [*Hymenoclea salsola-Brickellia incana*] (Keeler-Wolf and Thomas 2000)
  - 33.200.08 Cheesebush - Spiny Senna [*Hymenoclea salsola-Senna armata*] (Keeler-Wolf and Thomas 2000)
- 33.210.00 Sonoran Mixed Woody and Succulent Scrub {33220}
- 33.211.00 Mojave Mixed Woody Scrub {34210}
- 33.212.00 Mojave Mixed Steppe{34220}
- 33.213.00 Mojave Wash Scrub {34250}
- \*33.220.00 Desert Apricot [*Prunus fremontii*] (Keeler-Wolf *et al.* 1998){37400}
- \*33.225.00 Graythorn Unique Stand [*Ziziphus obtusifolia*] (Keeler-Wolf 2001)
- \*33.230.00 Hackberry Scrub [*Celtis laevigata*] (Keeler-Wolf and Thomas 2000)
- \*33.240.00 Stanbury's Antelope Brush Scrub [*Purshia mexicana*] (Keeler-Wolf and Thomas 2000)
- \*33.260.00 Sweetbush Riparian Scrub [*Bebbia juncea*] (Keeler-Wolf and Thomas 2000)
- \*33.270.00 California Ephedra [*Ephedra californica*] (Keeler-Wolf and Thomas 2000)
  - 33.270.01 California Ephedra - Cheesebush [*Ephedra californica-Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
- 33.280.00 Nevada Ephedra Scrub [*Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
  - 33.280.01 Nevada Ephedra [*Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
  - 33.280.02 Nevada Ephedra - Shadscale [*Ephedra nevadensis-Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
  - 33.280.03 Nevada Ephedra - Bladder Sage [*Ephedra nevadensis-Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
  - 33.280.04 Nevada Ephedra [*Ephedra nevadensis- Lyceum andersonii*] (Keeler-Wolf and Thomas 2000)
- 33.290.00 Spiny Menodora Scrub [*Menodora spinescens*] (Keeler-Wolf and Thomas 2000)
- 33.300.00 Desert Almond Scrub [*Prunus fasciculata*] (Keeler-Wolf and Thomas 2000)
  - 33.300.01 Desert Almond [*Prunus fasciculata*] (Keeler-Wolf and Thomas 2000)

- 33.300.02 Desert Almond - Bladder Sage [*Prunus fasciculata-Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
- \*33.300.03 Desert Almond - Skunkbrush [*Prunus fasciculata-Rhus trilobata*] (Keeler-Wolf and Thomas 2000)
- \*33.300.04 Desert Almond - Stanbury's Antelope Bush [*Prunus fasciculata-Purshia mexicana*] (Keeler-Wolf and Thomas 2000)
- \*33.300.05 Desert Almond - Woolly Bursage [*Prunus fasciculata-Ambrosia eriocentra*] (Keeler-Wolf and Thomas 2000)
- \*33.300.06 Desert Almond - Net-veined Viguiera - (Utah Mortonia) [*Prunus fasciculata-Viguiera reticulata-(Mortonia utahensis)*] (Keeler-Wolf and Thomas 2000)
  
- 33.310.00 Bladder Sage Scrub [*Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
- 33.310.01 Bladder Sage [*Salazaria mexicana*] (Keeler-Wolf and Thomas 2000)
  
- \*33.320.00 Blue Sage Dwarf Scrubland [*Salvia dorrii*] (Keeler-Wolf and Thomas 2000)
- \*33.320.01 Blue Sage [*Salvia dorrii*] (Keeler-Wolf and Thomas 2000)
  
- \*33.330.00 Arizona Honeysweet Scrub [*Tidestromia oblongifolia*] (Keeler-Wolf and Thomas 2000)
  
- \*33.340.00 Chuparosa Scrub [*Justicia californica*] (Keeler-Wolf 2001)
  
- \*33.350.00 Chuckawallabush [*Tetracoccus hallii*] unique stands (Keeler-Wolf 2001)
  
- 33.360.00 Anderson's Wolfberry [*Lycium andersonii*] (Keeler-Wolf 2001)
- 33.360.01 Anderson's Wolfberry - Jojoba - Big Galleta [*Lycium andersonii-Simmondsia chinensis-Pleuraphis rigida*] (Keeler-Wolf 2001)
  
- 35.000.00 Great Basin Scrub
  
- 35.100.00 Sagebrush Scrub [*Artemisia* spp.] {35200}
- 35.101.00 Subalpine Sagebrush Scrub [*Artemisia* spp.] {35220}
- 35.102.00 Sagebrush Steppe [*Artemisia* spp.] {35300}
- 35.110.00 Big Sagebrush Scrub [*Artemisia tridentata*] {35210}
- 35.110.01 Big Sagebrush - Rubber Rabbitbrush [*Artemisia tridentata-Chrysothamnus nauseosus*] (Ferren & Davis 1991)
- \*35.110.02 Big Sagebrush [*Artemisia tridentata*] (Gordon & White 1994)
- 35.110.03 Desert Slope Sagebrush (Spolsky 1979)
- 35.110.04 Big Sagebrush - Desert Snowberry [*Artemisia tridentata-Symphoricarpos longiflorus*] (Taylor 1980)
- 35.110.05 Big Sagebrush - Blackbush [*Artemisia tridentata-Coleogyne ramosissima*] (Keeler-Wolf and Thomas 2000)
- 35.110.06 Big Sagebrush - Virgin River Encelia [*Artemisia tridentata-Encelia virginensis*] (Keeler-Wolf and Thomas 2000)
- 35.110.07 Big Sagebrush - Antelope Bitterbrush [*Artemisia tridentata-Purshia tridentata*] (Keeler-Wolf and Thomas 2000)
- 35.110.08 Big Sagebrush - Green Ephedra [*Artemisia tridentata-Ephedra viridis*] (Keeler-Wolf and Thomas 2000)
- 35.110.09 Big Sagebrush / Mountain Monardella [*Artemisia tridentata/Monardella odoratissima*] (Keeler-Wolf and Moore 2001)
- 35.110.10 Mountain Big Sagebrush / Shorthair Sedge [*Artemisia tridentata* var. *vaseyana/Carex filifolia*] (Keeler-Wolf and Moore 2001)
  
- 35.120.00 Low Sagebrush Dwarf Scrub [*Artemisia arbuscula*]

- \*35.120.01 Low Sagebrush / Mono Clover [*Artemisia arbuscula/Trifolium monoense*] (Major & Taylor 1977)
- 35.120.02 Low Sagebrush / Stemless Haplopappus [*Artemisia arbuscula/Stenotus acaulis*] (Major & Taylor 1977)
- \*35.120.03 Low Sagebrush / Idaho Fescue [*Artemisia arbuscula/Festuca idahoensis*] (Stillman 1980)
- 35.120.04 Low Sagebrush / Prickly Phlox [*Artemisia arbuscula/Leptodactylon pungens*] (Keeler-Wolf and Moore 2001)
- \*35.120.05 Low Sagebrush / slender buckwheat [*Artemisia arbuscula-Eriogonum microthecum*] (Keeler-Wolf and Moore 2001)
  
- 35.130.00 Black Sagebrush Dwarf Scrub [*Artemisia nova*] {47000}
  - \*35.130.01 Southern Montane Black Sagebrush Pebble Plains [*Artemisia nova*]
  - \*35.130.02 Black Sagebrush - Engelmann's Hedgehog Cactus [*Artemisia nova-Echinocereus engelmannii*] (Keeler-Wolf and Thomas 2000)
  - \*35.130.03 Black Sagebrush - Cheesebush [*Artemisia nova-Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
  
- \*35.140.00 Rothrock Sagebrush Scrub [*Artemisia rothrockii*]
  - \*35.140.01 Rothrock Sagebrush / Heretic Penstemon [*Artemisia rothrockii/Penstemon heterodoxus*] (Benedict 1983)
  - \*35.140.02 Rothrock Sagebrush / Mountain Monardella [*Artemisia rothrockii/Monardella odoratissima*] (Taylor 1984)
  - \*35.140.03 Rothrock Sagebrush (*Artemisia rothrockii*) Holcomb Valley, San Bernardino Mtns (CNPS veg-fest 2000)
  
- \*35.150.00 Silver Sagebrush Scrub [*Artemisia cana*] (Keeler-Wolf and Moore 2001)
  
- 35.200.00 Antelope Bitterbrush Scrub [*Purshia tridentata*]
  - 35.200.01 Antelope Bitterbrush - Big Sagebrush - Horesebush [*Purshia tridentata-Artemisia tridentata-Tetradymia canescens*] (Keeler-Wolf and Moore 2001)
  - 35.200.02 Antelope Bitterbrush - Big Sagebrush / Indian Ricegrass [*Purshia tridentata-Artemisia tridentata/Achnatherum hymenoides*] (Keeler-Wolf and Moore 2001)
  - 35.200.03 Antelope Bitterbrush - Big Sagebrush - Round-leaf Snowberry [*Purshia tridentata-Artemisia tridentata-Symphoricarpos rotundifolia*] (Keeler-Wolf and Moore 2001)
  - 35.200.04 Antelope Bitterbrush / Nelson's Needlegrass [*Purshia tridentata/Achnatherum nelsonii*] (Keeler-Wolf and Moore 2001)
  - 35.200.05 Antelope Bitterbrush / Sulphur-flower Buckwheat [*Purshia tridentata/Eriogonum umbellatum*] (Keeler-Wolf and Moore 2001)
  
- 35.300.00 Rabbitbrush Scrub [*Chrysothamnus* spp.]
- 35.310.00 Rubber Rabbitbrush Scrub [*Chrysothamnus nauseosus*]
- \*35.320.00 Parry Rabbitbrush Dwarf Scrub [*Chrysothamnus parryi*] {35410}
- 35.330.00 Needle-leaved Rabbitbrush [*Chrysothamnus teretifolius*] {39000}
- 35.340.00 Blackstem Rabbitbrush [*Chrysothamnus paniculatus*] (Keeler-Wolf and Thomas 2000)
  
- 36.000.00 Chenopod Scrub {36000}
  - 36.100.00 Iodine Bush Succulent Scrub [*Allenrolfea occidentalis*]
  - \*36.110.00 Great Valley Iodine Bush Scrub [*Allenrolfea occidentalis*]

- \*36.120.00 Desert Iodine Bush Scrub [*Allenrolfea occidentalis*]
- \*36.120.01 Saltgrass - Iodine Bush [*Distichlis spicata*-*Allenrolfea occidentalis*] (Bradley 1970)
- \*36.120.02 Bush Seepweed - Iodine Bush [*Suaeda moquinii*-*Allenrolfea occidentalis*] (Bradley 1970)
- \*36.120.03 Alkali Sacaton - Iodine Bush [*Sporobolus airoides*-*Allenrolfea occidentalis*] (Odion *et al* 1992)
- \*36.120.04 Iodine Bush [*Allenrolfea occidentalis*] (McHargue 1973)
  
- 36.200.00 Bush Seepweed Scrub [*Suaeda moquinii*]
- \*36.200.01 Great Valley Bush Seepweed Scrub [*Suaeda moquinii*]
- \*36.200.02 Desert Bush Seepweed Scrub [*Suaeda moquinii*]
- 36.200.03 Bush Seepweed - Iodine Bush [*Suaeda moquinii*-*Allenrolfea occidentalis*] (Bradley 1970)
- 36.200.04 Bush Seepweed - Fourwing Saltbush [*Suaeda moquinii*-*Atriplex canescens*] (Keeler-Wolf and Thomas 2000)
  
- 36.300.00 Saltbush Scrub and Dwarf Scrub [*Atriplex* spp.]
- 36.301.00 Desert Saltbush Scrub [*Atriplex* spp.] {36110}
- 36.302.00 Valley Saltbush Scrub [*Atriplex* spp.] {36220}
- 36.303.00 Interior Coast Range Saltbush Scrub [*Atriplex* spp.] {36320}
- 36.310.00 Fourwing Saltbush Scrub [*Atriplex canescens*]
- 36.310.01 Fourwing Saltbush [*Atriplex canescens*] (Keeler-Wolf 2001)
- 36.320.00 Shadscale Scrub [*Atriplex confertifolia*] {36140}
- \*36.320.01 Greasewood - Shadscale [*Sarcobatus vermiculatus*-*Atriplex confertifolia*] (Ferren & Davis 1991)
- 36.320.02 Shadscale - Nevada Ephedra [*Atriplex confertifolia*-*Ephedra nevadensis*] (Ferren & Davis 1991)
- 36.320.03 Shadscale - White Bursage [*Atriplex confertifolia*-*Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
- 36.320.04 Shadscale - Blackbush [*Atriplex confertifolia*-*Coleogyne ramosissima*] (Keeler-Wolf and Thomas 2000)
- 36.320.05 Shadscale - Sticky Snakeweed - Catclaw Horsebrush [*Atriplex confertifolia*-*Gutierrezia microcephala*-*Tetradymia axillaris*] (Keeler-Wolf and Thomas 2000)
- 36.320.06 Shadscale - Fourwing Saltbush [*Atriplex confertifolia*-*Atriplex canescens*] (Keeler-Wolf and Thomas 2000)
- 36.320.07 Shadscale - Anderson's Wolfberry [*Atriplex confertifolia*-*Lycium andersonii*] (Keeler-Wolf and Thomas 2000)
- 36.320.08 Shadscale - Winter Fat [*Atriplex confertifolia*-*Krascheninnikovia lanata*] (Keeler-Wolf and Thomas 2000)
- 36.320.09 Shadscale - Virgin River Encelia - Hop-sage [*Atriplex confertifolia*-*Encelia virginensis*-*Grayia spinosa*] (Keeler-Wolf and Thomas 2000)
  
- 36.330.00 Desert-holly Scrub [*Atriplex hymenelytra*]
- 36.330.01 Desert-holly [*Atriplex hymenelytra*] (Keeler-Wolf and Thomas 2000)
- 36.330.02 Desert-holly - White Bursage [*Atriplex hymenelytra*-*Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
- 36.330.03 Desert-holly - Creosote Bush - White Bursage [*Atriplex hymenelytra*-*Larrea tridentata*-*Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
- 36.330.04 Desert-holly - Arizona Honeysweet [*Atriplex hymenelytra*-*Tidestromea oblongifolia*] (Keeler-Wolf and Thomas 2000)

- 36.340.00 Allscale Scrub [*Atriplex polycarpa*] {23200}
- \*36.341.00 Great Valley Allscale Scrub [*Atriplex polycarpa*] {36220}
- \*36.342.00 Sierra-Tehachapi Saltbush Scrub [*Atriplex* spp.] {36310}
- \*36.350.00 Spinescale Scrub [*Atriplex spinifera*]
- \*36.351.00 Great Valley Spinescale Scrub [*Atriplex spinifera*] {36220}
- 36.360.00 Mixed Saltbush [*Atriplex* spp.]
  - 36.360.01 Mixed Saltbush [*Atriplex* spp.] (McHargue 1973)
  - 36.360.02 Allscale - Shadscale [*Atriplex polycarpa*-*Atriplex confertifolia*] (Yoder *et al.* 1983)
- 36.370.00 Quailbush Scrub [*Atriplex lentiformis*]
  - 36.370.01 Big Saltbush - Allscale Scrub [*Atriplex lentiformis*] (Keeler-Wolf, Vaghti 2000)
- \*36.400.00 Greasewood Scrub [*Sarcobatus vermiculatus*] {36130}
- \*36.500.00 Winter Fat dwarf scrub [*Krascheninnikovia lanata*]
- 36.600.00 Valley Saltbush Scrub [*Atriplex* spp.]
- 36.700.00 Desert Sink Scrub {36210}
- 36.800.00 Valley Sink Scrub {36210}
- 37.000.00 Undifferentiated Chaparral Scrubs {37000}
  - 37.000.01 Northern Mixed Chaparral {37110}
  - \*37.000.02 Gabbroic Northern Mixed Chaparral {37111}
  - \*37.000.03 Mafic Southern Mixed Chaparral {37122}
  - 37.000.04 Semi-Desert Chaparral {37400}
  - 37.000.05 Mixed Montane Chaparral {37510}
  - \*37.000.06 Mixed Serpentine Chaparral {37610}
  - 37.000.07 Northern North Slope Chaparral {37E10}
  - 37.000.08 Coastal Sage Chaparral Scrub {37G00}
  - 37.000.09 Island Chaparral {37700}
- 37.100.00 Chaparral with Chamise with or without other codominant shrubs {37200}
  - 37.101.00 Chamise Chaparral [*Adenostoma fasciculatum*]
    - 37.101.01 Chamise - Bigberry Manzanita [*Adenostoma fasciculatum*-*Arctostaphylos glauca*] (Gordon & White 1994)
    - 37.101.02 Chamise - Black Sage [*Adenostoma fasciculatum*-*Salvia mellifera*] (Gordon & White 1994)
    - 37.101.03 Chamise - California Buckwheat - White Sage [*Adenostoma fasciculatum*-*Eriogonum fasciculatum*-*Salvia apiana*] (Gordon & White 1994)
    - 37.101.04 Chamise - Chaparral Yucca [*Adenostoma fasciculatum*-*Yucca whipplei*] (Gordon & White 1994)
    - 37.101.05 Chamise - Cupleaf Ceanothus [*Adenostoma fasciculatum*-*Ceanothus greggii*] (Gordon & White 1994)
    - \*37.101.06 Chamise - Cupleaf Ceanothus - Mafic Soils [*Adenostoma fasciculatum*-*Ceanothus greggii*] (Gordon & White 1994)

- 37.101.07 Chamise - Eastwood Manzanita [*Adenostoma fasciculatum*-*Arctostaphylos glandulosa*] (Gordon & White 1994)
- 37.101.08 Chamise - Hoaryleaf Ceanothus [*Adenostoma fasciculatum*-*Ceanothus crassifolius*] (Gordon & White 1994)
- 37.101.09 Chamise - Scrub Oak [*Adenostoma fasciculatum*-*Quercus berberidifolia*] (Gordon & White 1994)
- 37.101.10 Chamise - Wedgeleaf Ceanothus [*Adenostoma fasciculatum*-*Ceanothus cuneatus*] (Gordon & White 1994)
- 37.101.11 Chamise - Woollyleaf Ceanothus [*Adenostoma fasciculatum*-*Ceanothus tomentosus*] (Gordon & White 1994)
- \*37.101.12 Chamise / Bush Monkeyflower [*Adenostoma fasciculatum*/*Mimulus aurantiacus*] (Keeler-Wolf, *et al.* 2001)
  
- 37.102.00 Chamise - Black Sage Chaparral [*Adenostoma fasciculatum*-*Salvia mellifera*]
- \*37.102.01 Southern Maritime Chaparral {37C30}
- 37.102.02 Chamise - Black Sage / Herb [*Adenostoma fasciculatum*-*Salvia mellifera*/Herb] (Hogan & Sawyer 1996)
- \*37.102.03 Chamise - Black Sage - Mixed Shrub [*Adenostoma fasciculatum*-*Salvia mellifera*/Mixed Shrub] (Hogan & Sawyer 1996)
  
- 37.103.00 Chamise - White Sage Chaparral [*Adenostoma fasciculatum*-*Salvia apiana*]
- 37.103.01 Chamise - White Sage [*Adenostoma fasciculatum*-*Salvia apiana*] (Gordon & White 1994)
  
- 37.104.00 Chamise - Bigberry Manzanita Chaparral [*Adenostoma fasciculatum*- *Arctostaphylos glauca*]
- 37.104.01 Chamise - Bigberry Manzanita [*Adenostoma fasciculatum*-*Arctostaphylos glauca*] (Gordon & White 1994)
- 37.104.02 Chamise - Bigberry Manzanita - Chaparral Whitethorn [*Adenostoma fasciculatum*-*Arctostaphylos glauca*-*Ceanothus leucodermis*] (Gordon & White 1994)
- 37.104.03 Chamise - Bigberry Manzanita - Chaparral-Yucca [*Adenostoma fasciculatum*-*Arctostaphylos glauca*-*Yucca whipplei*] (Gordon & White 1994)
- 37.104.04 Chamise - Bigberry Manzanita - Cupleaf Ceanothus [*Adenostoma fasciculatum*-*Arctostaphylos glauca*-*Ceanothus gregii*] (Gordon & White 1994)
- 37.104.05 Chamise - Bigberry Manzanita - Hoaryleaf Ceanothus [*Adenostoma fasciculatum*-*Arctostaphylos glauca*-*Ceanothus crassifolius*] (Gordon & White 1994)
- 37.104.06 Chamise - Bigberry Manzanita - Scrub Oak [*Adenostoma fasciculatum*-*Arctostaphylos glauca*-*Quercus berberidifolia*] (Gordon & White 1994)
- 37.104.07 Chamise - Bigberry Manzanita - Wedgeleaf Ceanothus [*Adenostoma fasciculatum*-*Arctostaphylos glauca*-*Ceanothus cuneatus*] (Gordon & White 1994)
  
- 37.105.00 Chamise - Cupleaf Ceanothus Chaparral [*Adenostoma fasciculatum*-*Ceanothus gregii*]
- 37.105.01 Chamise - Cupleaf Ceanothus [*Adenostoma fasciculatum*-*Ceanothus gregii*] (Gordon & White 1994)
- \*37.105.02 Chamise / Mafic Soils [*Adenostoma fasciculatum*] (Gordon & White 1994)
  
- 37.106.00 Chamise - Eastwood Manzanita Chaparral [*Adenostoma fasciculatum*- *Arctostaphylos glandulosa*]
- 37.106.01 Chamise - Eastwood Manzanita - Birchleaf Mountain-mahogany [*Adenostoma fasciculatum*-*Arctostaphylos glandulosa*-*Cercocarpus betuloides*] (Gordon & White 1994)
- 37.106.02 Chamise - Eastwood Manzanita - Chaparral Whitethorn [*Adenostoma fasciculatum*-*Arctostaphylos glandulosa*-*Ceanothus leucodermis*] (Gordon & White 1994)

- 37.106.03 Chamise - Eastwood Manzanita - Cupleaf Ceanothus [*Adenostoma fasciculatum-Arctostaphylos glandulosa-Ceanothus greggii*] (Gordon & White 1994)
- 37.106.04 Chamise - Eastwood Manzanita - Hoaryleaf Ceanothus [*Adenostoma fasciculatum-Arctostaphylos glandulosa-Ceanothus crassifolius*] (Gordon & White 1994)
- 37.106.05 Chamise - Eastwood Manzanita / Mafic Soils [*Adenostoma fasciculatum-Arctostaphylos glandulosa*] (Gordon & White 1994)
- 37.106.06 Chamise - Eastwood Manzanita - Birchleaf Mountain-mahogany [*Adenostoma fasciculatum-Arctostaphylos glandulosa-Cercocarpus betuloides*] (Gordon & White 1994)
- 37.106.07 Chamise - Eastwood Manzanita - Wedgeleaf Ceanothus [*Adenostoma fasciculatum-Arctostaphylos glandulosa-Ceanothus cuneatus*] (Gordon & White 1994)
- 37.106.08 Chamise - Eastwood Manzanita [*Adenostoma fasciculatum-Arctostaphylos glandulosa*] (Parker 1990)
- 37.106.09 Chamise - Eastwood Manzanita - Musk Brush / Serpentine Reed Grass [*Adenostoma fasciculatum-Arctostaphylos glandulosa-Ceanothus jepsonii/Calamagrostis ophitidis*] (Keeler-Wolf, et al. 2001)
- 37.106.10 Chamise - Eastwood Manzanita - Interior Live Oak [*Adenostoma fasciculatum-Arctostaphylos glandulosa-Quercus wislizeni*] (Keeler-Wolf, et al. 2001)
- 37.107.00 Chamise - Hoaryleaf Ceanothus Chaparral [*Adenostoma fasciculatum-Ceanothus crassifolius*]
- 37.107.01 Chamise - Hoaryleaf Ceanothus [*Adenostoma fasciculatum-Ceanothus crassifolius*] (Gordon & White 1994)
- 37.107.02 Chamise - Hoaryleaf Ceanothus-Black Sage [*Adenostoma fasciculatum-Ceanothus crassifolius-Salvia mellifera*] (Gordon & White 1994)
- 37.108.00 Chamise - Wedgeleaf Ceanothus Chaparral [*Adenostoma fasciculatum-Ceanothus cuneatus*]
- 37.108.01 Chamise - Wedgeleaf Ceanothus [*Adenostoma fasciculatum-Ceanothus cuneatus*] (Gordon & White 1994)
- \*37.109.00 Chamise - Mission-manzanita - Woollyleaf Ceanothus Chaparral [*Adenostoma fasciculatum-Xylococcus bicolor-Ceanothus tomentosus*]
- 37.109.01 Chamise - Mission-manzanita [*Adenostoma fasciculatum-Xylococcus bicolor*] (Gordon & White 1994)
- 37.109.02 Chamise - Mission-manzanita-Woollyleaf Ceanothus [*Adenostoma fasciculatum-Xylococcus bicolor-Ceanothus tomentosus*] (Gordon & White 1994)
- \*37.109.03 Chamise - Mission-manzanita - Woollyleaf Ceanothus (mafic soils) [*Adenostoma fasciculatum-Xylococcus bicolor-Ceanothus tomentosus*] (Gordon & White 1994)
- \*37.109.04 Chamise - Woollyleaf Ceanothus [*Adenostoma fasciculatum-Ceanothus tomentosus*] (Gordon & White 1994)
- 37.200.00 Chaparral with *Ceanothus* spp. as principal indicator
- 37.201.00 Bigpod Ceanothus Chaparral [*Ceanothus megacarpus*] {37840}
- 37.201.01 Bigpod Ceanothus [*Ceanothus megacarpus*] (Borchert et al. 1993b)
- 37.201.02 Bigpod Ceanothus - Chamise / Black Sage [*Ceanothus megacarpus-Adenostoma fasciculatum/Salvia mellifera*] (Borchert et al. 1993b)
- 37.202.00 Bigpod Ceanothus - Birchleaf Mountain-mahogany Chaparral [*Ceanothus megacarpus-Cercocarpus betuloides*] (Borchert, et al. 2000)
- 37.203.00 Bigpod Ceanothus - Hollyleaf Redberry Chaparral [*Ceanothus megacarpus-Rhamnus ilicifolia*] (Borchert, et al. 2000)

- 37.204.00 Blue Blossom Chaparral [*Ceanothus thyrsiflorus*] {37820}
  - 37.204.01 Blue Blossom Ceanothus - Coyote Brush - Poison Oak [*Ceanothus thyrsiflorus-Baccharis pilularis-Toxicodendron diversilobum*] (Keeler-Wolf, *et al.* 2001)
- 37.205.00 Chaparral Whitethorn Chaparral [*Ceanothus leucodermis*] {37532}
  - 37.205.01 Chaparral Whitethorn [*Ceanothus leucodermis*] (Gordon & White 1994)
- 37.206.00 Deerbrush Montane Chaparral [*Ceanothus integerrimus*] {37531}
  - 37.206.01 Deerbrush [*Ceanothus integerrimus*] (Gordon & White 1994)
  - 37.206.02 Deerbrush - Canyon Live Oak - Blue Wildrye [*Ceanothus integerrimus-Quercus chrysolepis-Elymus glaucus*] (Stuart *et al.* 1993)
  - 37.206.03 Tanoak - Madrone - Deerbrush [*Lithocarpus densiflora-Arbutus menziesii-Ceanothus integerrimus*] (Stuart *et al.* 1993)
  - 37.206.04 Deerbrush - Whiteleaf Manzanita [*Ceanothus integerrimus-Arctostaphylos viscida*] (Keeler-Wolf and Moore 2001)
- 37.207.00 Hairyleaf Ceanothus Chaparral [*Ceanothus oliganthus*]
  - 37.207.01 Hairyleaf Ceanothus [*Ceanothus oliganthus*] (Gordon & White 1994)
- 37.208.00 Hoaryleaf Ceanothus Chaparral [*Ceanothus crassifolius*] {37830}
  - 37.208.01 Hoaryleaf Ceanothus [*Ceanothus crassifolius*] (Gordon & White 1994)
- 37.209.00 Mountain Whitethorn Montane Chaparral [*Ceanothus cordulatus*]
  - 37.209.01 Mountain Whitethorn [*Ceanothus cordulatus*] (Keeler-Wolf and Moore 2001)
- 37.210.00 Tobacco Brush Montane Chaparral [*Ceanothus velutinus*] {37533}
  - 37.210.01 Tobacco Brush [*Ceanothus velutinus*] (Keeler-Wolf and Moore 2001)
  - 37.210.02 Tobacco Brush - Bitter Cherry [*Ceanothus velutinus-Prunus emarginata*] (Keeler-Wolf and Moore 2001)
- 37.211.00 Wedgeleaf Ceanothus Chaparral [*Ceanothus cuneatus*] {37810}
  - 37.211.01 Wedgeleaf Ceanothus [*Ceanothus cuneatus*] Stuart *et al.* 1992)
  - 37.211.02 Wedgeleaf Ceanothus - Incense-cedar [*Ceanothus cuneatus-Calocedrus decurrens*] (Stuart *et al.* 1992)
  - 37.211.03 Wedgeleaf Ceanothus / Squirreltail [*Ceanothus cuneatus/Elymus elymoides*] (Taylor & Teare 1979b)
  - 37.211.04 Wedgeleaf Ceanothus / Annual Grass [*Ceanothus cuneatus/Bromus spp.-Vulpia spp.*] (Keeler-Wolf and Moore 2001)
- 37.212.00 Cupleaf Ceanothus - Fremontia - Oak Chaparral [*Ceanothus greggii-Fremontodendron californicum-Quercus* sp.] {37J00}
  - 37.212.01 Cupleaf Ceanothus [*Ceanothus greggii*] (Gordon & White 1994)
  - 37.212.02 Birchleaf Mountain-mahogany - Chamise [*Cercocarpus betuloides-Adenostoma fasciculatum*] (Gordon & White 1994)
  - 37.212.03 Birchleaf Mountain-mahogany - Flannelbush [*Cercocarpus betuloides-Fremontodendron californicum*] (Gordon & White 1994)
  - \*37.212.04 entry moved to 37.418.00
- 37.213.00 Bigpod Ceanothus - Hollyleaf Cherry Chaparral [*Ceanothus megacarpus-Prunus ilicifolia*] (Borchert, *et al.* 2000)
- 37.214.00 Greenbark Ceanothus Scrub [*Ceanothus spinosus*] (Borchert, *et al.* 2000)
- \*37.215.00 Siskiyou Mat dwarf scrub [*Ceanothus pumilus*] (Jimerson *et al.* 1995)
  - \*37.215.01 Siskiyou mat / Idaho Fescue [*Ceanothus pumilus/Festuca idahoensis*] (Jimerson *et al.* 1995)

- 37.300.00 Chaparral with Manzanita [*Arctostaphylos* spp.] as principal indicator {37B00}
- 37.301.00 Bigberry Manzanita Chaparral [*Arctostaphylos glauca*]  
37.301.01 Bigberry Manzanita [*Arctostaphylos glauca*] (Gordon & White 1994)
- 37.302.00 Eastwood Manzanita Chaparral [*Arctostaphylos glandulosa*]  
37.302.01 Eastwood Manzanita [*Arctostaphylos glandulosa*] (Gordon & White 1994)  
37.302.02 Adams Manzanita [*Arctostaphylos glandulosa* ssp. *adamsii*]  
37.302.03 Eastwood Manzanita-Mountain Mahogany [*Arctostaphylos glandulosa*-*Cercocarpus betuloides*]  
37.302.04 Eastwood Manzanita - Interior Live Oak [*Arctostaphylos glandulosa*-*Quercus wislizeni*] (Keeler-Wolf, *et al.* 2001)
- 37.303.00 Greenleaf Manzanita Chaparral [*Arctostaphylos patula*]  
37.303.01 Greenleaf Manzanita [*Arctostaphylos patula*] (Keeler-Wolf and Moore 2001)
- \*37.304.00 Ione Manzanita Chaparral [*Arctostaphylos myrtifolia*]
- 37.305.00 Whiteleaf Manzanita Chaparral [*Arctostaphylos viscida*]  
37.305.01 Whiteleaf Manzanita [*Arctostaphylos viscida*] (Keeler-Wolf and Moore 2001)
- \*37.306.00 Sensitive Manzanita Scrub [*Arctostaphylos nummularia*] (Keeler-Wolf, *et al.* 2001)  
\*37.306.01 Sensitive Manzanita – Black Huckleberry- Giant Chinquapin (*A. nummularia*-*Vaccinium ovatum*-*Chrysolepis chrysophylla*)(Keeler-Wolf *et al.* 2001)
- \*37.307.00 Mount Tamalpais Manzanita [*Arctostaphylos hookeri* ssp. *montana*] Unique Stands (Keeler-Wolf, *et al.* 2001)
- \*37.308.00 Woollyleaf Manzanita Chaparral [*Arctostaphylos tomentosa* spp. *tomentosa*]  
\*37.308.01 Northern Maritime Chaparral {37C10}  
\*37.308.02 Central Maritime Chaparral {37C20}
- \*37.309.00 Ione Chaparral {37D00} (may include other associations and alliances compared to 37.304.00)
- 37.310.00 Pink-bracted Manzanita [*Arctostaphylos pringlei* ssp. *drupacea*] (Keeler-Wolf *et al.* 1998)  
37.310.01 Pink-Bracted Manzanita -Point-leaf Manzanita [*Arctostaphylos pringlei* ssp. *drupacea*- *Arctostaphylos pungens*] (Keeler-Wolf *et al.* 1998)
- 37.400.00 Chaparral with Oak [*Quercus* spp.] as principal indicator
- 37.401.00 Interior Live Oak Chaparral [*Quercus wislizeni*] {37A00}
- 37.402.00 Interior Live Oak - Canyon Live Oak Chaparral [*Quercus wislizeni*-*Quercus chrysolepis*]  
37.402.01 Interior Live Oak - Canyon Live Oak [*Quercus wislizeni*-*Quercus chrysolepis*] (Gordon & White 1994)
- 37.403.00 Interior Live Oak - Chaparral Whitethorn Chaparral [*Quercus wislizeni*-*Ceanothus leucodermis*]  
37.403.01 Shrub Interior Live Oak - Chaparral Whitethorn [*Quercus wislizeni*-*Ceanothus leucodermis*] (Gordon & White 1994)  
37.403.02 Shrub Interior Live Oak - Chaparral Whitethorn - Eastwood Manzanita [*Quercus wislizeni*-*Ceanothus leucodermis*-*Arctostaphylos glandulosa*] (Gordon & White 1994)
- 37.404.00 Interior Live Oak - Scrub Oak Chaparral [*Quercus wislizeni*-*Quercus berberidifolia*]

- 37.405.00 Leather Oak Chaparral [*Quercus durata*] {37620}
- \*37.405.01 Leather Oak - Eastwood Manzanita [*Quercus durata-Arctostaphylos glandulosa*] (Keeler-Wolf, *et al.* 2001)
- 37.406.00 Mixed Scrub Oak Chaparral
- 37.406.01 Scrub Oak - Bigberry Manzanita [*Quercus berberidifolia-Arctostaphylos glauca*] (Gordon & White 1994)
- 37.406.02 Scrub Oak - Deerbrush [*Quercus berberidifolia-Ceanothus integerrimus*] (Gordon & White 1994)
- \*37.406.03 Scrub Oak - Hairyleaf Ceanothus [*Quercus berberidifolia-Ceanothus oliganthus*] (Gordon & White 1994)
- \*37.406.04 Scrub Oak - Toyon [*Quercus berberidifolia-Heteromeles arbutifolia*] (Gordon & White 1994)
- 37.406.05 Scrub Oak - Wedgeleaf Ceanothus [*Quercus berberidifolia-Ceanothus cuneatus*] (Gordon & White 1994)
- 37.406.06 Scrub Oak - Woollyleaf Ceanothus [*Quercus berberidifolia-Ceanothus tomentosus*] (Gordon & White 1994)
- 37.407.00 Scrub Oak Chaparral [*Quercus berberidifolia*] {37900}
- 37.407.01 Scrub Oak / California Buckeye [*Quercus berberidifolia/Aesculus californica*] (Newton 1987)
- 37.407.02 Scrub Oak [*Quercus berberidifolia*] (Gordon & White 1994)
- 37.407.03 Scrub Oak - (Chamise - Eastwood Manzanita) [*Quercus berberidifolia-Adenostoma fasciculatum-Arctostaphylos glandulosa*] (Gordon & White 1994)
- 37.407.04 Scrub Oak - (Toyon) [*Quercus berberidifolia- (Heteromeles arbutifolia)*] (Gordon & White 1994)
- 37.407.05 Scrub Oak - (Chaparral Whitethorn) [*Quercus berberidifolia-(Ceanothus leucodermis)*] (Gordon & White 1994)
- 37.407.06 Scrub Oak - (Birchleaf Mountain-mahogany) [*Quercus berberidifolia-(Cercocarpus betuloides)*] (Gordon & White 1994)
- 37.408.00 Scrub Oak - Birchleaf Mountain-mahogany Chaparral [*Quercus berberidifolia-Cercocarpus betuloides*]
- 37.408.01 Scrub Oak - Birchleaf Mountain-mahogany [*Quercus berberidifolia-Cercocarpus betuloides*] (Gordon & White 1994)
- 37.408.02 Scrub Oak - Birchleaf Mountain-mahogany - Cupleaf Ceanothus [*Quercus berberidifolia-Cercocarpus betuloides-Ceanothus greggii*] (Gordon & White 1994)
- \*37.408.03 Foothill Ash - Birchleaf Mountain-mahogany - Scrub Oak [*Fraxinus dipetala-Cercocarpus betuloides-Quercus berberidifolia*] (Gordon & White 1994)
- \*37.408.04 Scrub Oak - Birchleaf Mountain-mahogany - Palmer Ceanothus [*Quercus berberidifolia-Cercocarpus betuloides-Ceanothus palmeri*] (Gordon & White 1994)
- 37.409.00 Scrub Oak - Chamise Chaparral [*Quercus berberidifolia-Adenostoma fasciculatum*]
- 37.409.01 Scrub Oak - Chamise - Hoaryleaf Ceanothus [*Quercus berberidifolia-Adenostoma fasciculatum-Ceanothus crassifolius*] (Gordon & White 1994)
- 37.409.02 Scrub Oak - Chamise - Cupleaf Ceanothus [*Quercus berberidifolia-Adenostoma fasciculatum-Ceanothus greggii*] (Gordon & White 1994)
- 37.410.00 Scrub Oak - Chaparral Whitethorn Chaparral [*Quercus berberidifolia-Ceanothus leucodermis*]
- 37.410.01 Scrub Oak - Chaparral Whitethorn [*Quercus berberidifolia-Ceanothus leucodermis*] (Gordon & White 1994)
- 37.411.00 Brewer Oak Chaparral [*Quercus garryana var. breweri*] {37541}

- \*37.411.01 Oregon White Oak - Brewer Oak / California Fescue [*Quercus garryana* var. *garryana*-*Quercus garryana* var. *breweri*/*Festuca californica*] (Jimerson 1993)
- \*37.411.02 White Fir / Huckleberry Oak [*Abies concolor*/*Quercus vaccinifolia*] (Sawyer 1981b)
- \*37.412.00 Sadler Oak Montane Scrub [*Quercus sadleriana*]
- 37.413.00 Canyon Live Oak Chaparral [*Quercus chrysolepis*]
  - 37.413.01 Canyon Live Oak Shrub [*Quercus chrysolepis*] (Gordon & White 1994)
  - 37.413.02 Canyon Live Oak - (Deerbrush - Chaparral Whitethorn) Shrub [*Quercus chrysolepis*-(*Ceanothus integerrimus*-*Ceanothus leucodermis*)] (Gordon & White 1994)
  - \*37.413.03 Canyon Live Oak - Silk Tassle Bush [*Quercus chrysolepis*-*Garrya flavescens*] (Keeler-Wolf and Thomas 2000)
  - 37.413.04 Canyon Live Oak - Holly-leaf Redberry [*Quercus chrysolepis*-*Rhamnus illicifolia*] (Gordon & White 1994)
- 37.414.00 Huckleberry Oak Chaparral [*Quercus vaccinifolia*] {37542}
  - 37.414.01 Huckleberry Oak [*Quercus vaccinifolia*] (Keeler-Wolf and Moore 2001)
  - 37.414.02 Huckleberry Oak - Bush Chinquapin [*Quercus vaccinifolia*-*Chrysolepis sempervirens*] (Keeler-Wolf and Moore 2001)
  - 37.414.03 Huckleberry Oak - Greenleaf Manzanita [*Quercus vaccinifolia*-*Arctostaphylos patula*] (Keeler-Wolf and Moore 2001)
- 37.415.00 Muller Oak [*Quercus cornelius-mulleri*]
  - 37.415.01 Muller Oak - Sugarbush [*Quercus cornelius-mulleri*-*Rhus ovata*] (Keeler-Wolf et al. 1998)
  - 37.415.02 Muller Oak - Brittlebush-Narrowleaf Goldenbush [*Quercus cornelius-mulleri*-*Eriogonum fasciculatum*-*Ericameria linearifolia*] (Keeler-Wolf et al. 1998)
  - 37.415.03 Muller Oak - Mountain Mahogany [*Quercus cornelius-mulleri*-*Cercocarpus betuloides*] (Keeler-Wolf et al. 1998)
- 37.416.00 Island Scrub Oak Chaparral [*Quercus pacifica*] (Landis, 1997)
- 37.417.00 Giant Chinquapin Scrub [*Chrysolepis chrysophylla*] (Keeler-Wolf, et al. 2001)
  - 37.417.01 Giant Chinquapin / Black Huckleberry [*Chrysolepis chrysophylla* / *Vaccinium ovatum*] (Keeler-Wolf, et al. 2001)
- 37.418.00 Tucker Oak Scrub [*Quercus john-tuckeri*] (Borchert, 2000)
- 37.500.00 Chaparral with Red Shank [*Adenostoma sparsifolium*] as principal indicator
  - \*37.501.00 Red Shank Chaparral [*Adenostoma sparsifolium*]
    - \*37.501.01 Red Shank [*Adenostoma sparsifolium*] (Gordon & White 1994)
  - 37.502.00 Red Shank - Birchleaf Mountain-mahogany Chaparral [*Adenostoma sparsifolium*-*Cercocarpus betuloides*]
    - \*37.502.01 Red Shank - Birchleaf Mountain-mahogany [*Adenostoma sparsifolium*-*Cercocarpus betuloides*] (Gordon & White 1994)
  - \*37.503.00 Red Shank - Chamise Chaparral [*Adenostoma sparsifolium*-*Adenostoma fasciculatum*]
    - \*37.503.01 Red Shank - Chamise - Birchleaf Mountain-mahogany [*Adenostoma sparsifolium*-*Adenostoma fasciculatum*-*Cercocarpus betuloides*] (Gordon & White 1994)

- \*37.503.02 Red Shank - Chamise - Cupleaf Ceanothus [*Adenostoma sparsifolium-Adenostoma fasciculatum-Ceanothus greggii*] (Gordon & White 1994)
- \*37.503.03 Red Shank - Chamise - Pointleaf Manzanita [*Adenostoma sparsifolium-Adenostoma fasciculatum-Arctostaphylos pungens*] (Gordon & White 1994)
- \*37.504.00 Red Shank Chaparral {37300}
- 37.600.00 Birchleaf Mountain-mahogany - California buckwheat Chaparral [*Cercocarpus betuloides-Eriogonum fasciculatum*]
- 37.600.01 Birchleaf Mountain-mahogany - California Buckwheat [*Cercocarpus betuloides-Eriogonum fasciculatum*] (Gordon & White 1994)
- 37.610.00 Birchleaf Mountain-mahogany Woodland [*Cercocarpus betuloides* var. *betuloides*] (Keeler-Wolf and Moore 2001)
- 37.610.01 Birchleaf Mountain-mahogany [*Cercocarpus betuloides* var. *betuloides*] (Keeler-Wolf and Moore 2001)
- 37.700.00 Bush Chinquapin Montane Chaparral [*Chrysolepis sempervirens*] {37540}
- 37.700.01 Bush Chinquapin [*Chrysolepis sempervirens*] (Keeler-Wolf and Moore 2001)
- 37.800.00 Sumac Scrub [*Rhus* sp., *Malosma laurina*]
- \*37.801.00 Sugarbush Scrub [*Rhus ovata*] (Keeler-Wolf et al. 1998)
- \*37.802.00 Skunkbush [*Rhus trilobata*] (Keeler-Wolf et al., 1998)
- 37.900.00 Bitter Cherry Scrub [*Prunus emarginata*] (Keeler-Wolf and Moore 2001)
- 37.900.01 Bitter Cherry [*Prunus emarginata*] (Keeler-Wolf and Moore 2001)
- 37.910.00 Holly-leaf Cherry [*Prunus illicifolia*] (Borchert, et al. 2000)
- 37.910.01 Holly-leaf Cherry - Sanicle [*Prunus illicifolia-Sanicula crassicaulis*] (Keeler-Wolf, et al. 2001)
- 37.915.00 Toyon – Hollyleaf Cherry Scrub [*Heteromeles arbutifolia-Prunus illicifolia*] (Borchert, et al. 2000)
- 37.920.00 Coffeeberry Scrub [*Rhamnus californica*] (Keeler-Wolf, et al. 2001)
- 37.920.01 Coffeeberry - Coyote Brush / California Figwort [*Rhamnus californica-Baccharis pilularis/Scrophularia californica*] (Keeler-Wolf, et al. 2001)
- 37.930.00 California Wax Myrtle Scrub [*Myrica californica*] (Keeler-Wolf, et al. 2001)
- 37.930.01 California Wax Myrtle [*Myrica californica*] (Keeler-Wolf, et al. 2001)
- 37.940.00 Poison Oak Scrub [*Toxicodendron diversilobum*] (Keeler-Wolf, et al. 2001)
- 37.940.01 Poison Oak - Coyote Brush - Thimbleberry [*Toxicodendron diversilobum-Baccharis pilularis-Rubus parviflorus*] (Keeler-Wolf, et al. 2001)
- 37.950.00 Hazel Scrub [*Corylus cornuta*] (Keeler-Wolf, et al. 2001)
- 37.950.01 Hazel / Western Sword Fern [*Corylus cornuta/Polystichum munitum*] (Keeler-Wolf, et al. 2001)
- 38.000.00 Subalpine Upland Shrub
- 38.100.00 Sierra Subalpine Upland Shrub
- 38.100.01 Shrub Cinquefoil Dwarf Scrub [*Potentilla fruticosa*] (Burke 1982)
- 38.100.02 Compact Phlox - Stemless Haplopappus - Alpine Ipomopsis dwarf scrub [*Phlox pulvinata-Stenotus acaulis-Ipomopsis congesta*] (Major & Taylor 1977)

- 38.100.03 Granite-gilia / King Ricegrass Dwarf Scrub [*Leptodactylon pungens/Ptilagrostis kingii*] (Major & Taylor 1977)
- 38.100.04 entry moved to 38.120.02
- 38.100.05 Podistera - Pygmy Fleabane [*Podistera-Eriogonum pygmaeus*] (Major & Taylor 1977)
- 38.100.06 Wax Currant / Purple Reedgrass [*Ribes cereum/Calamagrostis purpurascens*] (Major & Taylor 1977)
- \*38.100.07 Red Elderberry - Congdon Sedge [*Sambucus racemosa-Carex congdonii*] (Taylor 1984)
- 38.100.08 entry moved to 41.211.01
- 38.100.09 entry moved to 38.100.01
  
- \*38.110.00 Shrubby Cinquefoil [*Potentilla fruticosa*] (Keeler-Wolf and Moore 2001)
- 38.110.01 Shrub Cinquefoil - One-seeded Oatgrass [*Potentilla fruticosa-Danthonia unispicata*] (Taylor 1984)
- 38.110.02 Shrub Cinquefoil - One-seeded Oatgrass [*Potentilla fruticosa-Danthonia intermedia*] (Keeler-Wolf and Moore 2001)
  
- 38.120.00 Alpine Goldenbush - Nuttall Sandwort [*Ericameria discoidea-Minuartia nuttallii*] (Keeler-Wolf and Moore 2001)
- 38.120.01 Nuttall Sandwort [*Minuartia nuttallii*] (Taylor 1984)
- 38.120.02 Granite-gilia / Alpine Goldenbush [*Leptodactylon pungens/Ericameria discoidea*] (Major & Taylor 1977)
- 38.120.03 Alpine Goldenbush - Timberline Phacelia [*Ericameria discoidea-Phacelia frigida*] (Taylor 1984)
  
- 39.000.00 *Holodiscus* Scrub and Dwarf Scrub with *Holodiscus* spp.
  
- 39.100.00 *Holodiscus* Scrub and Dwarf Scrub
- 39.100.01 Ocean Spray / Suksdorf Monkeyflower [*Holodiscus discolor* var. *microphyllus/Mimulus suksdorfii*] (Burke 1982)
- 39.100.02 Western Needlegrass - Nude Buckwheat [*Stipa occidentalis-Eriogonum nudum*] (Burke 1982)
- 39.100.03 Ocean Spray / Greenleaf Manzanita [*Holodiscus discolor/Arctostaphylos patula*] (Sawyer & Thornburgh 1997)
- 39.100.04 Ocean Spray / Wedgeleaf Keckiella [*Holodiscus discolor/Keckiella corymbosa*] (Taylor & Teare 1979a)
- 39.100.05 Ocean Spray / Sierra Stonecrop - Parsley Fern [*Holodiscus discolor/Sedum obtusatum-Cryptogramma acrostichoides*] (Keeler-Wolf and Moore 2001)
  
- 40.000.00 GRASS & HERB DOMINATED COMMUNITIES
  
- 41.000.00 Native Grassland
  
- \*41.010.00 Alkali Sacaton Bunchgrass Grassland [*Sporobolus airoides*] {42120}
- \*41.010.01 Alkali Sacaton Grassland [*Sporobolus airoides*] (Keeler-Wolf and Thomas 2000)
  
- \*41.020.00 Ashy Ryegrass Bunchgrass Grassland [*Leymus cinereus*]
  
- \*41.030.00 Big Galleta Bunchgrass Grassland [*Pleuraphis rigida*]
- \*41.030.01 Big Galleta [*Pleuraphis rigida*] (Keeler-Wolf and Thomas 2000)
- \*41.030.02 Big Galleta - Rayless Goldenhead [*Pleuraphis rigida-Acamptopappus sphaerocephalus*] (Keeler-Wolf and Thomas 2000)
- \*41.030.03 Big Galleta - Cooper's Goldenbush [*Pleuraphis rigida-Ericameria cooperi*] (Keeler-Wolf and Thomas 2000)

- \*41.030.04 Big Galleta - Downy Dalea [*Pleuraphis rigida*-*Dalea molissima*] (Keeler-Wolf and Thomas 2000)
- \*41.040.00 Bluebunch Wheatgrass Bunchgrass Grassland [*Pseudoroegneria spicata* spp. *spicata*]
- \*41.050.00 California Oatgrass Bunchgrass Grassland [*Danthonia californica*]
  - \*41.050.01 California Oatgrass - Tall-oatgrass [*Danthonia californica*-*Arrhenatherum elatius*] (Grenier 1989)
  - \*41.050.02 Squirreltail - California Oatgrass [*Elymus elymoides*-*Danthonia californica*] (Stuart *et al.* 1992)
  - \*41.050.03 California Oatgrass - Pull-up Muhly [*Danthonia californica*-*Muhlenbergia filiformis*] (Helms & Ratliff 1987)
  - 41.050.04 California Oatgrass - Silver European Hairgrass [*Danthonia californica*-*Aira caryophyllea*] (Keeler-Wolf, *et al.* 2001)
- \*41.051.00 Intermediate Oatgrass Grassland [*Danthonia intermedia*] (Keeler-Wolf and Moore 2001)
- 41.060.00 Grasslands with Common Reed [*Phragmites australis*]
- 41.061.00 Alkali Common Reed [*Phragmites australis*]
- \*41.070.00 Cordgrass Saline/Alkaline Grassland [*Spartina* spp.]
  - \*41.070.01 California Cordgrass [*Spartina foliosa*] (Atwater *et al.* 1979)
  - \*41.070.02 Dense-flowered Cordgrass [*Spartina densiflora*] (Eicher 1987)
  - \*41.070.03 Alkali Cordgrass - Alkali Sacaton [*Spartina gracilis*-*Sporobolus airoides*] (Oidon *et al.* 1992)
- \*41.080.00 Creeping Ryegrass Grassland [*Leymus triticoides*] {42140}
- \*41.090.00 Desert Needlegrass Grassland [*Achnatherum speciosum*]
- \*41.110.00 Foothill Needlegrass [*Nassella lepida*]
- \*41.120.00 Indian Ricegrass [*Achnatherum hymenoides*]
- \*41.130.00 Needle-and-thread [*Hesperostipa comata*]
- \*41.140.00 Nodding Needlegrass [*Nassella cernua*]
- \*41.150.00 Purple Needlegrass [*Nassella pulchra*]
  - \*41.150.01 Italian Ryegrass - Purple Needlegrass [*Lolium mutiflorum*-*Nassella pulchra*] (Fiedler & Leidy 1987)
  - \*41.150.02 Wild Oats - Purple Needlegrass [*Avena fatua*-*Nassella pulchra*] (Parker 1990)
  - \*41.150.03 Purple Needlegrass / Purple Sanicle [*Nassella pulchra*/*Sanicula bipinnatifida*] (Stuart *et al.* 1993)
- \*41.160.00 Lemmon's Needlegrass [*Achnatherum lemmonii*]
- \*41.170.00 Valley Needlegrass Grassland [*Achnatherum* spp.] {42110}
- \*41.180.00 One-sided Bluegrass [*Poa secunda*] {42150}
- \*41.181.00 One-sided Bluegrass Pebble Plains

- \*41.190.00 Pacific Reedgrass [*Calamagrostis nutkaensis*]
- \*41.190.01 Pacific Reedgrass - Coyote Brush [*Calamagrostis nutkaensis-Baccharis pilularis*] (Keeler-Wolf, *et al.* 2001)
- \*41.190.02 Pacific Reedgrass - Slough Sedge - Rush [*Calamagrostis nutkaensis-Carex obnupta. - Juncus spp.*] (Keeler-Wolf, *et al.* 2001)
  
- 41.200.00 Saltgrass [*Distichlis spicata*]
- \*41.200.01 Saltgrass - Iodine Bush [*Distichlis spicata-Allenrolfea occidentalis*] (Bradley 1970)
- \*41.200.02 Saltgrass - Cooper Rush [*Distichlis spicata-Juncus cooperi*] (Bradley 1970)
- \*41.200.03 Greasewood - Saltgrass [*Sarcobatus vermiculatus-Distichlis spicata*] (Ferren & Davis 1991)
- \*41.200.04 Saltgrass - Alkali Rabbitbrush [*Distichlis spicata-Chrysothamnus albidus*] (Odion *et al.* 1992)
- 41.200.05 Baltic Rush - Saltgrass [*Juncus balticus-Distichlis spicata*] (Odion *et al.* 1992)
- \*41.200.06 Jaumea - Saltgrass [*Jaumea carnosa-Distichlis spicata*] (Peinado *et al.* 1994)
- \*41.200.07 Saltgrass - Alkali Heath - Jaumea [*Distichlis spicata-Frankenia salina-Jaumea carnosa*] (Keeler-Wolf, *et al.* 2001)
- \*41.200.08 Alkali Saltgrass
  
- 41.210.00 Shorthair Reedgrass [*Calamagrostis breweri*]
- 41.210.01 Shorthair Reedgrass - Alpine Aster [*Calamagrostis breweri-Aster alpigenus*] (Benedict 1983)
- 41.210.02 Shorthair Reedgrass - Spike Trisetum [*Calamagrostis breweri-Trisetum spicatum*] (Benedict 1983)
- 41.210.03 Shorthair Reedgrass - Bilberry [*Calamagrostis breweri-Vaccinium caespitosum*] (Major & Taylor 1977)
- 41.210.04 Drummond Rush - Shorthair Reedgrass [*Juncus drummondii-Calamagrostis breweri*] (Taylor 1984)
- 41.210.05 Shorthair Reedgrass - Mountain Laurel [*Calamagrostis breweri-Kalmia polifolia*] (Taylor 1984)
  
- 41.211.00 Purple Reedgrass [*Calamagrostis purpurascens*] (Keeler-Wolf and Moore 2001)
- 41.211.01 Purple reedgrass - Granite-gilia [*Calamagrostis purpurascens-Leptodactylon pungens*] (Taylor 1984)
- 41.211.02 Purple reedgrass- Parry rabbitbrush- Granite-gilia [*Calamagrostis purpurascens-Chrysothamnus parryi ssp. Monocephalus-Leptodactylon pungens*] (Taylor 1984)
  
- 41.220.00 Tufted Hairgrass [*Deschampsia caespitosa*]
- 41.220.01 Tufted hairgrass - Nebraska Sedge [*Deschampsia caespitosa-Carex nebrascensis*] (Allen-Diaz 1991)
- \*41.220.02 Tufted Hairgrass - Brewer Bitter-cress [*Deschampsia caespitosa-Cardamine breweri*] (Benedict 1983)
- 41.220.03 Tufted Hairgrass - Sierra Ragwort [*Deschampsia caespitosa-Senecio scorzonella*] (Benedict 1983)
- 41.220.04 Tufted Hairgrass - Sierra Ragwort - Yarrow [*Deschampsia caespitosa-Senecio scorzonella-Achillea millefolium*] (Benedict 1983)
- \*41.220.05 Vernal Grass - Tufted Hairgrass [*Anthoxanthum odoratum-Deschampsia caespitosa*] (Heady *et al.* 1977)
- 41.220.06 Mt. Dana Sedge - Tufted Hairgrass [*Carex subnigricans-Deschampsia caespitosa*] (Major & Taylor 1977)
- 41.220.07 Tufted Hairgrass - Northern Goldenrod [*Deschampsia caespitosa-Solidago multiradiata*] (Taylor 1984)

- \*41.220.08 Tufted Hairgrass [*Deschampsia caespitosa*] (Keeler-Wolf and Moore 2001)
- 41.220.09 Tufted Hairgrass - California Oatgrass [*Deschampsia caespitosa-Danthonia californica*] (Keeler-Wolf, et al. 2001)
- \*41.220.10 Tufted Hairgrass - Longstalk Clover [*Deschampsia caespitosa-Trifolium longipes*] (Ratliff 1982, 1985)
  
- 41.222.00 Tall Mannagrass [*Glyceria elata*] (Keeler-Wolf and Moore 2001)
  - 41.222.01 Tall Mannagrass [*Glyceria elata*] (Keeler-Wolf and Moore 2001)
  - 41.222.02 Tall Mannagrass - Small-fruited Bulrush [*Glyceria elata-Scirpus microphyllus*] (Halpern 1986)
  - 41.222.03 Tall Mannagrass - Stream Deervetch [*Glyceria elata-Lotus longifolius*] (Halpern 1986)
  
- 41.224.00 Canadian Reedgrass [*Calamagrostis canadensis*] (Keeler-Wolf and Moore 2001)
  - 41.224.01 Canadian Reedgrass [*Calamagrostis canadensis*] (Keeler-Wolf and Moore 2001)
  
- 41.224.00 Sierra Ricegrass [*Ptilogrostis kingii*] (Keeler-Wolf and Moore 2001)
  - 41.224.01 Sierra Ricegrass [*Ptilogrostis kingii*] (Keeler-Wolf and Moore 2001)
  
- 41.230.00 Squirreltail [*Elymus elymoides*]
- 41.240.00 Green Fescue [*Festuca viridula*]
- \*41.250.00 Idaho Fescue [*Festuca idahoensis*]
- \*41.255.00 Red Fescue [*Festuca rubra*] (Keeler-Wolf, et al. 2001)
- \*41.260.00 Native Dunegrass [*Leymus mollis*] {21210}
  - \*41.260.01 Native dunegrass - Hottentot-fig [*Leymus mollis-Carpobrotus edulis*] (Bluestone 1981)
  - \*41.260.02 Native Dunegrass - European Beachgrass [*Leymus mollis-Ammophila arenaria*] (LaBanca 1993)
  - \*41.260.03 Native Dunegrass - Sea Rocket [*Leymus mollis-Cakile sp.*] (Parker 1974)
  
- \*41.270.00 Coastal Terrace Prairie {41100}
- \*41.280.00 Serpentine Bunchgrass {42130}
- \*41.290.00 Wildflower Field {42300}
- \*41.300.00 Great Basin Grassland {43000}
- 41.340.00 MOVED TO 42.051.00
- \*41.600.00 Eureka Valley Dunegrass [*Swallenia alexandrae*] (Keeler-Wolf and Thomas 2000) Unique stands
  
- \*41.610.00 Little Galleta Grassland [*Pleuraphis jamesii*] (Keeler-Wolf and Thomas 2000)
  - \*41.610.01 Little Galleta - California Buckwheat [*Pleuraphis jamesii-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
  - \*41.610.02 Little Galleta - Anderson's Wolfberry [*Pleuraphis jamesii-Lycium andersonii*] (Keeler-Wolf and Thomas 2000)
  - \*41.610.03 Little Galleta - Nevada Ephedra [*Pleuraphis jamesii-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)

- \*41.640.00 Blue Wildrye Grassland [*Elymus glaucus*] (Keeler-Wolf and Moore 2001)
  - \*41.640.01 Blue Wildrye [*Elymus glaucus*] (Keeler-Wolf and Moore 2001)
  - \*41.640.02 Blue Wildrye - Woolly Sedge [*Elymus glaucus-Carex lanuginosa*] (Keeler-Wolf and Moore 2001)
  - \*41.640.03 Blue Wildrye - Feta Sedge [*Elymus glaucus-Carex feta*] (Keeler-Wolf and Moore 2001)
  - \*41.640.04 Blue Wildrye - Cow-parsnip [*Elymus glaucus-Heracleum lanatum*] (Halpern 1986)
  
- 42.000.00 Non-native Grassland
  - 42.010.00 European Beachgrass [*Ammophila arenaria*]
    - 42.010.01 European Beachgrass - Australian Fireweed [*Ammophila arenaria-Erechtites minima*] (Parker 1974)
    - 42.010.02 Beachgrass [*Ammophila* sp.] (Duebendorfer 1989)
    - 42.010.03 European Beachgrass - sandmat [*Ammophila arenaria-Cardionema ramosissimum*] (Keeler-Wolf, et al. 2001)
  
  - 42.020.00 Cheatgrass [*Bromus tectorum*]
    - 42.020.01 Cheatgrass [*Bromus tectorum*] (Stuart et al. 1993)
    - 42.020.02 Cheatgrass - Ripgut [*Bromus tectorum-Bromus diandrus*] (White 1994a)
  
  - 42.025.00 Red Brome [*Bromus madritensis* ssp. *rubens*]
  
  - 42.026.00 Annual Brome [*Bromus (diandrus, hordeaceus)*] (Keeler-Wolf and Moore 2001)
    - 42.026.01 Ripgut Brome - Soft Chess - Annual Clover - Wild Carrot [*Bromus diandrus-Bromus hordeaceus-Trifolium* spp.-*Daucus* spp.] (Keeler-Wolf and Moore 2001)
    - 42.026.02 Soft Chess - Rattail Fescue [*Bromus hordeaceus-Vulpia hirsuta*] (Kopecko & Lathrop 1975)
    - 42.026.03 Slender Oat - Soft Brome [*Avena barbata-Bromus hordeaceus*](Kopecko & Lathrop 1975)
    - 42.026.04 Soft Chess – Silver hairgrass – Fileree [*Bromus hordaceus – Aira carryophyllea – Erodium* spp.] (Jimerson et al. 2001)
    - 42.026.05 Soft Chess – Meadowfoam – Clover [*Bromus hordaceus – Limnanthes douglasii – Trifolium* sp.] (Jimerson et al. 2001)
    - 42.026.06 Soft Chess - Silver hairgrass – Blue Dicks [*Bromus hordaceus – Aira carryophyllea-Dichelostemma capitatum* ssp. *capatatum*] (Jimerson et al. 2001)
    - 42.026.07 Soft Chess – Medusahead – Fileree [*Bromus hordaceus- Taeniantherum caput-medusae-Erodium botrys*] (Jimerson et al 2001)
    - 42.026.08 Soft Chess – Cheatgrass [*Bromus hordaceus-Bromus tectorum*] (Jimerson et al. 2001)
    - 42.026.09 Soft Chess – Fileree [*Bromus hordaceus-Erodium botrys*] (Jimerson et al 2001)
    - 42.026.10 Soft Chess – Blue Dicks – Gumplant [*Bromus hordaceus – Dichelostemma multiflorum – Grindelia camporum*] (Jimerson et al. 2001)
  
  - 42.030.00 Crested Wheatgrass [*Agropyron desertorum*]
  
  - 42.040.00 California Annual Grassland {42200}
    - 42.040.01 European Hairgrass [*Aira caryophyllea*] (Schlising & Sanders 1982)
    - 42.040.02 Soft Brome - Storkbill [*Bromus hordeaceus-Erodium botrys*] (Schlising & Sanders 1982)

- 42.040.03 Brachypodium [*Brachypodium distachyon*] (Keeler-Wolf, *et al.* 2001)
- 42.041.00 Dogtail Grass [*Cynosurus cristatus*] (Jimerson *et al.* 2001)
- 42.041.01 Dogtail – Hareleaf//rocky [*Cynosurus cristatus-Lagophylla glandulosa/rocky*] (Jimerson 1993, Jimerson *et al.* 2001)
- 42.041.02 Dogtail - Soft Chess - Dandelion [*Cynosurus cristatus-Bromus hordeaceus-Taraxacum officinale*] (Jimerson 1993, Jimerson *et al.* 2001)
- 42.041.03 Dogtail - Soft Chess – Cheatgrass [*Cynosurus cristatus-Bromus hordeaceus-Bromus tectorum*] (Jimerson *et al.* 2001)
- 42.041.04 Dogtail - Soft Chess – Medusahead [*Cynosurus cristatus-Bromus hordeaceus-Taeniantherum caput-medusae*] (Jimerson *et al.* 2001)
- 42.041.05 Dogtail - Soft Chess – Wild oat [*Cynosurus cristatus-Bromus hordeaceus-Avena fatua*] (Jimerson *et al.* 2001)
- 42.041.06 Dogtail – Tarplant [*Cynosurus cristatus-Hemizonia congesta-Madia spp.*] (Jimerson *et al.* 2001)
- 42.050.00 Introduced Perennial Grassland
- 42.050.01 Hairy Oatgrass - Vernal Grass [*Danthonia pilosa-Anthoxanthum odoratum*] (Hektner & Foin 1977)
- 42.050.02 Foothill Sedge - Tall-oatgrass [*Carex tumulicola-Arrhenatherum elatius*] (Grenier 1989)
- 42.050.03 Vernal Grass - Tufted Hairgrass [*Anthoxanthum odoratum-Deschampsia caespitosa*] (Heady *et al.* 1977b)
- 42.050.04 moved to 42.041.01
- 42.050.05 moved to 42.041.02
- 42.050.06 Tall-oatgrass - Dogtail – Blue dicks [*Arrhenatherum elatius- Cynosurus cristatus- Dichelostemma capitatum ssp. capitatum*] (Jimerson 1993, re-named; Jimerson *et al.* 2001)
- 42.050.07 Creeping Bent - Tall-oatgrass [*Agrostis stolonifera-Arrhenatherum elatius*] (Saenz & Sawyer 1986)
- 42.051.00 Harding Grass [*Phalaris aquatica*] (Keeler-Wolf and Vaghti 2000, Jimerson *et al.* 2001)
- 42.051.01 Harding Grass – Soft Chess – Yellow star thistle [*Phalaris aquatica – Bromus hordeaceus – Centaurea solstitialis*] (Jimerson *et al.* 2001)
- 42.060.00 Kentucky Bluegrass [*Poa pratensis*]
- 42.060.01 Kentucky Bluegrass - Sedge [*Poa pratensis-Carex spp.*] (Allen-Diaz 1991)
- 42.060.02 Kentucky Bluegrass - Silver Cinquefoil [*Poa pratensis-Potentilla gracilis*] (Allen-Diaz 1991)
- 42.060.03 Narrow Sedge - Kentucky Bluegrass [*Carex angustata-Poa pratensis*] (Allen-Diaz 1991)
- 42.060.04 Kentucky Bluegrass - Spreading Rush - Hairy Woodrush [*Poa pratensis-Juncus patens-Luzula comosa*] Stuart *et al.* 1993)
- 42.060.05 Kentucky Bluegrass [*Poa pratensis*] (Keeler-Wolf and Moore 2001)
- 42.070.00 Pampas Grass [*Cortaderia spp.*] (Keeler-Wolf & Vaghti, 2000)
- 42.080.00 Giant Reed [*Arundo donax*]
- 42.090.00 *Schismus* spp.
- 42.090.01 Schismus Playa association (Keeler-Wolf *et al.*, 1998)
- 42.100.00 Tall Wheatgrass [*Elytrigia pontica*] (Keeler-Wolf, Vaghti 2000)
- 41.310.00 Knotweed-Echinochloa Riparian Grassland [*Polygonum spp. - Echinochloa spp.*] (Keeler-Wolf, Vaghti 2000)
- 41.310.01 Echinochloa-Polygonum-Xanthium Riparian Grassland [*Echinochloa spp. - Polygonum spp.- Xanthium spp.*] (Keeler-Wolf, Vaghti 2000)

- 41.320.00 Rough Bentgrass Riparian Grassland [*Agrostis scabra*] (Keeler-Wolf, Vaghti 2000)
- 41.321.00 Italian Ryegrass [*Lolium multiflorum*] (Keeler-Wolf and Vaghti 2000)
- 44.000.00 Vernal Pools
  - 44.100.00 Northern Vernal Pools
    - \*44.110.00 Northern Hardpan Vernal Pools {44110}
      - \*44.110.01 Fremont Goldfields [*Lasthenia fremontii*] (Schlising & Sanders 1982)
    - 44.120.00 Northern Claypan Vernal Pools {44120}
      - \*44.120.01 Coyote-thistle - Alkali Heath Pools [*Eryngium castrense-Frankenia salina*] (Taylor *et al.* 1990)
      - \*44.120.02 Fremont Goldfields - Saltgrass Pools [*Lasthenia fremontii-Distichlis spicata*] (Taylor *et al.* 1990)
  - 44.130.00 Northern Volcanic Vernal Pools
    - 44.131.00 Northern Basalt Flow Vernal Pools {44131}
      - \*44.132.00 Northern Volcanic Mudflow Vernal Pools {44132}
        - \*44.132.01 California Goldfields - Two-crowned Downingia Pools [*Lasthenia californica-Downingia bicornuta*] (Taylor *et al.* 1990)
        - \*44.132.02 Whiteflower Navarretia - Dwarf Blennosperma Pools [*Navarretia leucocephala-Blennosperma nana*] (Taylor *et al.* 1990)
    - \*44.133.00 Northern Volcanic Ashflow Vernal Pools {44133}
  - 44.300.00 Southern Vernal Pools {44300}
    - \*44.310.00 Santa Rosa Plateau Vernal Pools {44310}
      - \*44.310.01 Dry Marsh Bed Zone (Kepecko & Lathrop 1975)
    - \*44.320.00 San Diego Mesa Vernal Pools {44321}
    - \*44.330.00 San Jacinto Valley Vernal Pools
- 45.000.00 Meadows and Seeps not dominated by grasses
  - 45.100.00 California Annual Herb-land (Keeler-Wolf and Moore 2001)
    - 45.100.01 Deervetch - Annual Clover - Lessengia [*Lotus* spp.- *Trifolium* spp.- *Lessengia* spp.] (Keeler-Wolf and Moore 2001)
  - 45.110.00 Sedge [*Carex* spp.]
    - 45.110.01 Longbeak Sedge - Shortbeak Sedge [*Carex rostrata-Carex simulata*] (Burke 1987)
    - 45.110.02 Shortbeak Sedge - Inflated Sedge [*Carex simulata-Carex vesicaria*] (Burke 1987)
    - \*45.110.03 Primrose Monkeyflower - Shore Sedge [*Mimulus primuloides-Carex limosa*] (Beguín & Major 1975)
    - \*45.110.04 Skyline Bluegrass - Beaked Sedge [*Poa cusickii-Carex utriculata*] (Beguín & Major 1975)
    - 45.110.05 Many-nerved Sedge - Yarrow [*Carex heteroneura-Achillea lanulosa*] (Benedict 1983)
    - 45.110.06 Slough Sedge - Salt Rush [*Carex obnupta-Juncus lesueurii*] (Duebendorfer 1989)

- \*45.110.07 Serrate Sedge - Leafly Sedge [*Carex subfusca-Carex amplifolia*]  
(Fiedler & Leidy 1987)
- 45.110.08 Alpine Pussytoes - Vernacular Sedge [*Antennaria alpina-Carex  
vernacula*] (Major & Taylor 1977)
- \*45.110.09 entry moved to 45.150.02
- 45.110.10 entry moved to 45.145.01
- \*45.110.11 Mount Dana Sedge - Little Elephant's Head [*Carex subnigricans-  
Pedicularis attollens*] (Major & Taylor 1977)
- 45.110.12 entry moved to 45.164.01
- 45.110.13 Diego Bentgrass - Ribbed Sedge [*Agrostis diegoensis-Carex  
multicostata*] (Stillman 1980)
- 45.110.14 entry moved to 45.164.02
- 45.110.15 entry moved to 45.150.01
- 45.110.16 entry moved to 45.145.02
- 45.110.17 Luzulaleaf Sedge - Water-plantain Buttercup [*Carex luzulifolia-  
Ranunculus alismifolius*] (Taylor 1984)
- 45.110.18 Mount Dana Sedge - Alpine Shootingstar [*Carex subnigricans-  
Dodecatheon alpinum*] (Taylor 1984)
- 45.110.19 Mount Dana Sedge - Alpine Pussytoes [*Carex subnigricans-Antennaria  
alpina*] (Taylor 1984)
- 45.110.20 entry moved to 45.155.01
- \*45.110.21 entry moved to 45.160.01
- 45.110.22 Vernacular Sedge - Alpine Pussytoes [*Carex vernacula-Antennaria  
alpina*] (Taylor 1984)
- 45.110.23 Western Yellow Cress - Dewey Sedge [*Rorippa curvisiliqua-Carex  
deweyana*] (Taylor 1984)
- 45.110.24 White-tipped Sedge - Junegrass [*Carex albonigra-Koeleria cristata*]  
(Taylor 1984)
- 45.110.25 Slough Sedge - Spreading Rush Tidal [*Carex obnupta-Juncus patens*]  
(Keeler-Wolf, *et al.* 2001)
  
- 45.120.00 Rocky Mountain Sedge [*Carex scopulorum*]
- 45.120.01 Rocky Mountain Sedge [*Carex scopulorum*] (Major & Taylor 1977)
- 45.120.02 Rocky Mountain Sedge - Elephant's Head [*Carex scopulorum-  
Pedicularis groenlandica*] (Taylor 1984)
- \*45.120.03 Rocky Mountain Sedge - Cotton-grass [*Carex scopulorum-Eriophorum  
criniger*] (Taylor 1984)
- 45.120.04 Rocky Mountain Sedge - Few-flowered Spikerush [*Carex scopulorum-  
Eleocharis pauciflora*] (Keeler-Wolf and Moore 2001)
  
- 45.130.00 Nebraska Sedge [*Carex nebrascensis*]
- 45.130.01 Nebraska Sedge [*Carex nebrascensis*] (Beguin & Major 1975)
- 45.130.02 Nebraska Sedge - Sierra Ricegrass [*Carex nebrascensis-Ptilagrostis  
kingii*] (Halpern 1986)
  
- 45.140.00 Shorthair Sedge [*Carex filifolia*]
- 45.140.01 Shorthair Sedge - Spike Trisetum [*Carex filifolia-Trisetum spicatum*]  
(Benedict 1983)
- 45.140.02 Shorthair Sedge - Sierra Ricegrass [*Carex filifolia-Ptilagrostis kingii*]  
(Benedict 1983)
- 45.140.03 Pussypaws - Shorthair Sedge [*Calyptridium umbellatum-Carex filifolia*]  
(Burke 1982)
- 45.140.04 Nude Buckwheat - Shorthair Sedge [*Eriogonum nudum-Carex filifolia*]  
(Burke 1982)
- 45.140.05 Talus fleabane - Shorthair Sedge [*Erigeron algidus-Carex filifolia*]  
(Burke 1982)
- 45.140.06 Shorthair Sedge [*Carex filifolia*] (Major & Taylor 1977)

- 45.140.07 Shorthair Sedge - Saxifrage [*Carex filifolia-Saxifraga aprica*] (Taylor 1984)
- 45.140.08 Shorthair Sedge - Heretic Penstemon [*Carex filifolia-Penstemon heterodoxus*] (Keeler-Wolf and Moore 2001)
- 45.145.00 Heller Sedge [*Carex helleri*] (Keeler-Wolf and Moore 2001)
  - 45.145.01 Heller Sedge - Parry Rush [*Carex helleri-Juncus parryi*] (Major & Taylor 1977)
  - 45.145.02 Heller Sedge - Club-moss Ivesia [*Carex helleri-Ivesia lycopodioides*] (Taylor 1984)
- 45.150.00 Brewer Sedge [*Carex breweri*] (Keeler-Wolf and Moore 2001)
  - 45.150.01 Brewer Sedge [*Carex breweri*] (Taylor 1984)
  - \*45.150.02 Brewer Sedge - Wheeler Bluegrass [*Carex breweri-Poa wheeleri*] (Major & Taylor 1977)
- 45.155.00 Showy Sedge [*Carex spectabilis*] (Keeler-Wolf and Moore 2001)
  - 45.155.01 Showy Sedge - Sibbaldia [*Carex spectabilis-Sibbaldia procumbens*] (Taylor 1984)
- 45.160.00 Congdon Sedge - Streambank Arnica [*Carex congdonii-Arnica amplexicaulis*] (Keeler-Wolf and Moore 2001)
  - \*45.160.01 Streambank Arnica - Congdon Sedge [*Arnica amplexicaulis-Carex congdonii*] (Taylor 1984)
- 45.162.00 Jones' Sedge [*Carex jonesii*] (Keeler-Wolf and Moore 2001)
- 45.164.00 Blackish Sedge [*Carex nigricans*] (Keeler-Wolf and Moore 2001)
  - 45.164.01 Bilberry - Blackish Sedge [*Vaccinium caespitosum-Carex nigricans*] (Major & Taylor 1977)
  - 45.164.02 Blackish Sedge - Mountain-laurel [*Carex nigricans-Kalmia polifolia*] (Taylor 1984)
- 45.166.00 Woolly Sedge [*Carex lanuginosa*] (Keeler-Wolf and Moore 2001)
- 45.168.00 Water Sedge [*Carex aquatilis*] (Keeler-Wolf and Moore 2001)
- 45.170.00 Inflated Sedge [*Carex vesicaria*] (Keeler-Wolf and Moore 2001)
  - 45.170.01 Inflated Sedge [*Carex vesicaria*] (Keeler-Wolf and Moore 2001)
- 45.200.00 Spikerushes [*Eleocharis* spp.]
- 45.210.00 Spikerush [*Eleocharis* spp.]
  - 45.210.01 Nevada Rush - Spikerush [*Juncus nevadensis-Eleocharis* spp.] (Beguin & Major 1975)
  - 45.210.02 Few-flowered Spikerush [*Eleocharis pauciflora*] (Benedict 1983)
  - \*45.210.03 Few-flowered Spikerush - Primrose Monkeyflower [*Eleocharis pauciflora-Mimulus primuloides*] (Benedict 1983)
  - 45.210.04 Mountain Spikerush - Cowbane [*Eleocharis montevidensis-Oxypolis occidentalis*] (Halpern 1986)
  - 45.210.05 Mountain Spikerush - Moss [*Eleocharis montevidensis-Moss*] (Halpern 1986)
  - \*45.210.06 Pale Spikerush - Water-starwort [*Eleocharis macrostachya-Callitriche hermaphroditica*] (Kepecko & Lathrop 1975)
  - \*45.210.07 Spikerush - Water Pygmy [*Eleocharis* spp.-*Crassula aquatica*] (Kepecko & Lathrop 1975)

- 45.210.08 Littlebeak Spikerush - Common Three-square [*Eleocharis rostellata-Scirpus americanus*] (Odion *et al.* 1992)
- \*45.210.09 Littlebeak Spikerush - Alkali Muhly [*Eleocharis rostellata-Muhlenbergia asperifolia*] (Odion *et al.* 1992)
- 45.300.00 Meadow and Seep Habitats {45000}
- 45.310.00 Montane Meadow
- 45.310.01 entry moved to 41.640.04
- 45.310.02 Bluejoint Reedgrass - Small-fruited Bulrush [*Calamagrostis canadensis-Scirpus microphyllus*] (Halpern 1986)
- 45.310.03 Rough Bentgrass [*Agrostis scabra*] (Halpern 1986)
- 45.310.04 entry moved to 41.222.02
- 45.310.05 entry moved to 41.222.03
- 45.310.06 Bracken Fern- Pale Hedge-nettle [*Pteridium aquilinum-Stachys rigida*] (Palmer 1979)
- 45.310.07 Gentian - Alpine Aster [*Gentiana newberryi-Aster alpigenus*] (Ratliff 1982, 1985)
- 45.310.09 Carpet Clover [*Trifolium monanthum*] (Ratliff 1982, 1985)
- 45.310.10 Angelica - Indian Paintbrush [*Angelica tomentosa-Castilleja miniata*] (Stillman 1980)
- 45.310.11 Diego Bentgrass - Ribbed Sedge [*Agrostis diegoensis-Carex multicosata*] (Stillman 1980)
- 45.310.12 Wet Montane Meadow {45110}
- 45.310.13 Dry Montane Meadow {45120}
- 45.312.00 Bigleaf Lupine alliance [*Lupinus latifolius*] (Keeler-Wolf and Moore 2001)
- 45.312.01 Bigleaf Lupine [*Lupinus latifolius*] (Keeler-Wolf and Moore 2001)
- 45.320.00 Subalpine Meadow
- 45.320.01 Skyline Bluegrass - Smooth-beaked Sedge [*Poa cusickii* spp.*epilis-Carex integra*] (Beguin & Major 1975)
- 45.320.02 Heretic Penstemon - Yarrow [*Penstemon heterodoxus-Achillea lanulosa*] (Benedict 1983)
- 45.320.03 Many-nerved Sedge - Yarrow [*Carex multicosata-Achillea lanulosa*] (Benedict 1983)
- 45.320.04 Tawny Buckwheat - Woolly Mountain-parsley [*Eriogonum incanum-Oreonana vestita*] (Benedict 1983)
- 45.320.05 Davis Knotweed - Tawny Buckwheat [*Polygonum davisiae-Eriogonum incanum*] (Major & Taylor 1977)
- 45.320.06 Pussypaws - Heretic Penstemon [*Calyptridium umbellatum-Penstemon heterodoxus*] (Major & Taylor 1977)
- 45.320.07 Jeffrey Shooting Star - Mertens Rush [*Dodecatheon jeffreyi-Juncus mertensianus*] (Palmer 1979)
- 45.320.08 Wet Subalpine or alpine meadow
- 45.400.00 Mountain Heather - Bilberry [*Phyllodoce* spp.-*Vaccinium caespitosum*]
- 45.400.01 Sierra Primrose [*Primula suffrutescens*] (Burke 1982)
- 45.400.02 Bilberry - Blackish Sedge [*Vaccinium caespitosum-Carex nigricans*] (Major & Taylor 1977)
- 45.400.03 Drummond Cinquefoil - Brewer Cinquefoil [*Potentilla drummondii-Potentilla breweri*] (Major & Taylor 1977)
- 45.405.00 Sierra Bilberry Scrub [*Vaccinium (caespitosum, scoparium)*] (Keeler-Wolf and Moore 2001)
- 45.410.00 Western Blueberry Scrub [*Vaccinium uliginosum*] (Keeler-Wolf and Moore 2001)

- 45.410.01 Western Blueberry [*Vaccinium uliginosum*] (Keeler-Wolf and Moore 2001)
- 45.415.00 Mountain Pride Penstemon [*Penstemon newberryi*] (Keeler-Wolf and Moore 2001)
- 45.415.01 Mountain Pride Penstemon - Mountain Jewelflower [*Penstemon newberryi-Streptanthus tortuosus*] (Taylor 1984)
- 45.415.02 Mountain Spiraea / Mountain Pride Penstemon - Mountain Jewelflower [*Spiraea densiflora/Penstemon newberryi-Streptanthus tortuosus*] (Keeler-Wolf and Moore 2001)
- 45.420.00 Canada Goldenrod [*Solidago canadensis*] (Keeler-Wolf and Moore 2001)
- 45.420.00 Canada Goldenrod - Yarrow [*Solidago canadensis-Achillea millefolium*] (Keeler-Wolf and Moore 2001)
- 45.421.00 Alpine Aster [*Aster alpigenus* spp. *andersonii*] (Keeler-Wolf and Moore 2001)
- 45.422.00 Cordilleran Arnica [*Arnica mollis*] (Keeler-Wolf and Moore 2001)
- 45.423.00 White Corn-lily [*Veratrum californicum*] (Keeler-Wolf and Moore 2001)
- 45.423.01 White Corn-lily - Arrowhead Butterweed [*Veratrum californicum-Senecio trangularis*] (Taylor 1984)
- 45.500.00 Alkali Meadow {45310}
- 45.550.00 Cocklebur Riparian Grassland [*Xanthium strumarium*] (Keeler-Wolf, Vaghti 2000)
- 45.555.00 Fennel [*Foeniculum vulgare*] (Keeler-Wolf, Vaghti 2000)
- 45.560.00 Rush Riparian Grassland [*Juncus* spp.] (Keeler-Wolf, *et al.* 2001)
- 45.561.00 Common Rush Riparian Grassland [*Juncus effusus* var. *brunneus*] (Keeler-Wolf, *et al.* 2001)
- 45.562.00 Baltic Rush Riparian Grassland [*Juncus balticus*] (Keeler-Wolf, Vaghti 2000)
- 45.562.01 Baltic Rush - Poison Hemlock [*Juncus balticus-Conium maculatum*] (Keeler-Wolf, Vaghti 2000)
- 45.562.02 Baltic Rush - (Mexican Rush) [*Juncus balticus-(Juncus mexicana)*] (Keeler-Wolf and Moore 2001)
- \*45.563.00 Cooper Rush Riparian Grassland [*Juncus cooperi*] (Keeler-Wolf and Thomas 2000)
- 45.564.00 Spreading Rush [*Juncus patens*] (Keeler-Wolf, *et al.* 2001)
- 45.565.00 Mexican Rush Riparian Grassland [*Juncus mexicanus*] (Keeler-Wolf and Thomas 2000)
- 45.566.00 Parry Rush [*Juncus parryi*] (Keeler-Wolf and Moore 2001)
- 45.566.01 Parry Rush - Vagus Buckwheat [*Juncus parryi-Eriogonum incanum*] (Taylor 1984)
- \*45.567.00 Sierra Rush [*Juncus nevadensis*] (Keeler-Wolf and Moore 2001)
- 45.600.00 Alkali Seep {45320}

45.700.00 Freshwater Seep {45400}

\*46.000.00 Alkali Playa Community {46000}

50.000.00 BOG AND MARSH {50000}

51.000.00 Bog and Fen {51000}

\*51.100.00 Fen Habitat {51110}{51200}

\*51.200.00 Darlingtonia Seep [*Darlingtonia californica*] {51120}

52.200.01 California pitcher plant-California cone flower [*Darlingtonia californica*-*Rudbeckia californica*] (re-named from Jimerson et al. 1995)

52.000.00 Marsh

52.100.00 Fresh - Brackish Water Marsh {52200}

52.100.01 Coastal and Valley Freshwater Marsh {52410}

52.100.02 Coastal Brackish Marsh {52200}

52.100.03 Montane Freshwater Marsh {52430}

52.100.04 Vernal Marsh {52500}

\*52.101.00 Bulrush [*Scirpus* spp.]

\*52.101.01 California Bulrush Wetland [*Scirpus californicus*] (Atwater et al. 1979)

\*52.101.02 moved to 52.111.04

\*52.101.03 moved to 52.111.05

\*52.101.04 Moved to 52.112.00

52.101.05 moved to 52.112.01

52.101.06 California Bulrush / Tule [*Scirpus californicus*/*S. acutus*] (Keeler-Wolf, Vaghti 2000)

52.101.07 Small-fruited Bulrush [*Scirpus microcarpus*] (Keeler-Wolf, et al. 2001)

52.102.00 Bulrush - Cattail Wetland [*Scirpus* spp.-*Typha* spp.]

52.102.01 Bulrush - Cattail [*Scirpus* spp.-*Typha* spp.] (Atwater et al. 1979)

52.102.02 Common Tule - Southern Cattail [*Scirpus acutus* - *Typha domingensis*] (Odion et al. 1992)

\*52.102.03 moved to 52.112.02

\*52.102.04 Brackish Bulrush – Cattail [*Scirpus* spp. - *Typha* spp.] {52200}

52.103.00 Cattail Wetland [*Typha* spp.]

\*52.103.01 Brackish Cattail [*Typha* spp.]

52.103.02 Broad-leafed Cattail [*Typha latifolia*] (Keeler-Wolf, et al. 2001)

52.104.00 Bur-reed Wetland [*Sparganium* spp.]

52.104.01 Narrowleaf Bur-reed [*Sparganium angustifolium*] (Keeler-Wolf and Moore 2001)

52.105.00 Duckweed Wetland [*Lemna* spp.]

52.106.00 Mosquito Fern Wetland [*Azolla filiculoides*]

\*52.107.00 Pondweeds with floating leaves Wetland [*Potamogeton* spp.]

\*52.108.00 Pondweeds with submerged leaves Wetland [*Potamogeton* spp.]

\*52.109.00 Quillwort Wetland [*Isoetes* spp.]

52.109.01 Western Spikerush [*Isoetes occidentalis*] (Keeler-Wolf and Moore 2001)

- \*52.110.00 Yellow Pond-lily Wetland [*Nuphar luteum*]
- 52.111.00 Common Three-square [*Scirpus americanus*] (Keeler-Wolf and Thomas 2000)
  - \*52.111.01 Common Three-square - Cooper Rush - Yerba Mansa [*Scirpus americanus-Juncus cooperi-Anemopsis californica*] (Keeler-Wolf and Thomas 2000)
  - \*52.111.02 Common Three-square/ Silverleaf Cinqufoil [*Scirpus americanus/Potentilla anserina*] (Keeler-Wolf, Vaghti 2001)
  - 52.111.03 Common Three-square/Perennial Pepperweed [*Scirpus americanus/Lepidium latifolium*] (Keeler-Wolf, Vaghti 2001)
  - 52.111.04 Common Three-square [*Scirpus americanus*] (Bradley 1970)
  - \*52.111.05 Common Three-square - Littlebeak Spikerush [*Scirpus americanus-Eleocharis rostellata*] (Odion *et al.* 1992)
- \*52.112.00 Alkali Bulrush [*Scirpus maritimus*] (Keeler-Wolf, Vaghti 2000)
  - \*52.112.01 Alkali Bulrush / Pickleweed [*Scirpus maritimus/Salicornia* spp.] (Keeler-Wolf, Vaghti 2000)
  - \*52.112.02 Alkali Bulrush – Cattail [*Scirpus maritima. - Typha* spp.] (Keeler-Wolf, Vaghti 2000)
- 52.120.00 Beaked Sedge Wetland [*Carex utriculata*]
  - 52.120.01 Beaked Sedge [*Carex utriculata*] (Taylor 1984, Halpern 1986, Potter 2000)
- 52.200.00 Salt - Alkali Marsh
  - \*52.201.00 Pickleweed Wetland [*Salicornia* spp.]
    - \*52.201.01 Common Pickleweed [*Salicornia virginica*] (Atwater *et al.* 1979)
    - \*52.201.02 Common Pickleweed - Gumplant [*Salicornia virginica-Grindelia stricta*] (Atwater *et al.* 1979)
    - \*52.201.03 Common Pickleweed - Saltgrass [*Salicornia virginica-Distichlis spicata*] (Atwater *et al.* 1979)
    - \*52.201.04 Common Pickleweed - Jaumea - Saltgrass [*Salicornia virginica-Jaumea carnosa*] (Eicher 1987)
    - \*52.201.05 Bigelow Pickleweed [*Salicornia bigelovii*] (Peinado *et al.* 1994)
    - 52.201.06 Northern Coastal Salt Marsh {52110}
    - \*52.201.07 South Coastal Pickleweed Salt Marsh
    - \*52.201.08 Alkali Pickleweed
    - 52.201.09 Southern Coastal Salt Marsh {52120}
    - 52.201.10 Common Pickleweed - Bigelow Pickleweed / Western Sea Purslane [*Salicornia virginica - Salicornia bigelovii / Sesuvium verrucosum*] (Keeler-Wolf, Vaghti 2000)
    - 52.201.11 Common Pickleweed - Bigelow Pickleweed / Saltbush [*Salicornia virginica - Salicornia bigelovii / Atriplex* spp.] (Keeler-Wolf, Vaghti 2000)
    - 52.201.12 Common Pickleweed - Bigelow Pickleweed / Saltgrass [*Salicornia virginica - Salicornia bigelovii / Distichlis spicata*] (Keeler-Wolf, Vaghti 2000)
    - 52.201.13 Common Pickleweed - Bigelow Pickleweed / Beardgrass [*Salicornia virginica - Salicornia bigelovii / Polypogon* spp.] (Keeler-Wolf, Vaghti 2000)
    - 52.201.14 Common Pickleweed - Saltgrass - Jaumea [*Salicornia virginica-Distichlis spicata-Jaumea carnosa*] (Keeler-Wolf, *et al.* 2001)
  - \*52.202.00 Ditch-grass Wetland [*Ruppia* spp.]

- 52.203.00 Cismontane Alkali Marsh {52310}
- 52.204.00 Transmontane Alkali Marsh {52320}
- 52.205.00 Perennial Pepperweed [*Lepidium latifolium*] (Keeler-Wolf, Vaghti 2000)
  - 52.205.01 Pepperweed - Saltgrass [*Lepidium latifolium* - *Distichlis* spp.] (Keeler-Wolf, Vaghti 2000)
- 52.206.00 Gumplant [*Grindelia stricta stricta*] (Keeler-Wolf, Vaghti 2000)
- 52.208.00 Birdfoot Trefoil [*Lotus corniculatus*] (Keeler-Wolf, Vaghti 2000)
- 52.209.00 Brass Buttons [*Cotula coronopifolia*] (Keeler-Wolf, Vaghti 2000)
- 52.210.00 Western Sea Purslane [*Sesuvium verrucosum*] (Keeler-Wolf, Vaghti 2000)
- 52.211.00 Spearscale [*Atriplex triangularis*] (Keeler-Wolf, Vaghti 2000)
- 52.500.00 Alkali Heath Dwarf Scrub [*Frankenia salina*] (Keeler-Wolf, Vaghti 2000)

60.000.00 RIPARIAN AND BOTTOMLAND HABITAT

61.000.00 Riparian Forest and Woodland

- 61.100.00 Cottonwood and Aspen Woodlands and Forests [*Populus* spp.]
- 61.111.00 Aspen Upland and Riparian Forests and Woodlands
  - \*61.111.01 Riparian Aspen Forest (Talley 1977)
  - \*61.111.02 Aspen [*Populus tremuloides*] (Potter 1994)
  - \*61.111.03 Aspen / White Corn-lily [*Populus tremuloides/Vertrum californicum*] (Riegel *et al.* 1990, Potter 1994)
  - \*61.111.04 Aspen / Upland [*Populus tremuloides*]
  - \*61.111.05 Aspen / Leafy Aster [*Populus tremuloides/Aster foliaceus*] (Riegel *et al.* 1990)
  - 61.111.06 Aspen / Big Sagebrush [*Populus tremuloides/Artemisia tridentata*] (Keeler-Wolf and Moore 2001)
  - 61.111.07 Aspen / Big Sagebrush / Mountain Monardella - Kelloggia [*Populus tremuloides/Artemisia tridentata/Monardella odoratissima-Kelloggia galioides*] (Keeler-Wolf and Moore 2001)
  - 61.111.08 Aspen / Mountain Monardella [*Populus tremuloides/Monardella odoratissima*] (Potter 1994)
  - 61.111.09 Aspen / Jeffrey Pine [*Populus tremuloides/Pinus jeffreyi*] (Keeler-Wolf and Moore 2001)
  - 61.111.10 Aspen / Woods Rose [*Populus tremuloides/Rosa woodsii*] (Keeler-Wolf and Moore 2001)
  - 61.111.11 Aspen - Lodgepole Pine / Big Sagebrush / Kentucky blue-grass [*Populus tremuloides-Pinus contorta/Artemisia tridentata/Poa pratensis*] (Keeler-Wolf and Moore 2001)
- \*61.120.00 Black Cottonwood Riparian Forests and Woodlands [*Populus balsamifera*] {61110}
  - \*61.120.01 North Coast Black Cottonwood [*Populus balsamifera*]
  - \*61.120.02 Montane Black Cottonwood [*Populus balsamifera*] {61530}
  - 61.120.03 Black Cottonwood - Jeffrey Pine [*Populus balsamifera-Pinus jeffreyi*] (Keeler-Wolf and Moore 2001)

- \*61.130.00 Fremont Cottonwood Riparian Forests and Woodlands [*Populus fremontii*]
- \*61.130.01 Great Valley Cottonwood Riparian [*Populus* spp.] {61410}
- \*61.130.02 Southern Cottonwood - Willow Riparian [*Populus* spp.-*Salix* spp.] {61330}
- \*61.130.03 Modoc - Great Basin Cottonwood - Willow Riparian [*Populus* spp.-*Salix* spp.]
- \*61.130.04 Mojave Riparian {61700}
- \*61.130.05 Sonoran Cottonwood - Willow Riparian [*Populus* spp.-*Salix* spp.] {61810}
- 61.130.06 Fremont Cottonwood [*Populus fremontii*] Sacramento River association (Vaghti 2003)
- 61.130.07 Fremont Cottonwood /Box-elder [*Populus fremontii/Acer negundo*] (Vaghti 2003)
- 61.130.08 Fremont Cottonwood/Box-elder/Hymalian Blackberry [*Populus fremontii/Acer negundo/Rubus discolor*] (Vaghti 2003)
- 61.130.09 Fremont Cottonwood/Douglas' Mugwort [*Populus fremontii/Artemisia douglasiana*] (Vaghti 2003)
- 61.130.10 Fremont Cottonwood/Common bedstraw [*Populus fremontii/Gallium aparine*] (Vaghti 2003)
- 61.130.11 Fremont Cottonwood/California Blackberry [*Populus fremontii/Rubus ursinus*] (Vaghti 2003)
- 61.130.12 Fremont Cottonwood-Gooddings Black Willow [*Populus fremontii-Salix gooddingii*] (Vaghti 2003)
- 61.130.13 Fremont Cottonwood/California Wild Grape [*Populus fremontii/Vitis californica*] (Vaghti 2003)
- 61.200.00 Willow Riparian Forests and Woodlands [*Salix* spp.]
- \*61.201.00 Arroyo Willow Riparian Forests and Woodlands [*Salix lasiolepis*]
- \*61.201.01 Central Coast Arroyo Willow Riparian [*Salix lasiolepis*] {61230}
- \*61.201.02 Southern Arroyo Willow Riparian [*Salix lasiolepis*]
- 61.201.03 Arroyo Willow / Blackberry Riparian [*Salix lasiolepis/Rubus* spp.] (Keeler-Wolf, *et al.* 2001)
- 61.201.04 Arroyo Willow - Shining Willow [*Salix lasiolepis-Salix lucida*] (Keeler-Wolf, *et al.* 2001)
- \*61.202.00 Black Willow Riparian Forests and Woodlands [*Salix gooddingii*]
- \*61.203.00 Hooker Willow Riparian Forests [*Salix hookeriana*]
- \*61.204.00 Pacific Willow Riparian Forests [*Salix lucida* ssp. *lasiandra*]
- 61.204.01 Shining Willow/Dwarf Nettle-Stinging Nettle [*Salix lucida/Urtica urens-U. dioica*] (Vaghti 2003)
- \*61.205.00 Red Willow Riparian Forests [*Salix laevigata*]
- 61.205.01 Red Willow [*Salix laevigata*] (Keeler-Wolf and Moore 2001)
- 61.205.02 Red Willow / Arroyo Willow [*Salix laevigata / Salix lasiolepis*] (Keeler-Wolf, Vaghti 2000)
- \*61.206.00 Sitka Willow Riparian Forests [*Salix sitchensis*]
- \*61.207.00 Mixed Willow Riparian Forests and Woodlands [*Salix* spp.]
- \*61.208.00 Southern Willow Scrub [*Salix* spp.]
- 61.209.00 Narrow-leaf Willow Riparian Scrub [*Salix exigua*] (Keeler-Wolf, Vaghti 2000)
- 61.209.01 Narrow-leaf Willow [*Salix exigua*] Sacramento River Stands (Vaghti 2003)

- 61.209.02      Narrow-leaf Willow /Giant Reed [*Salix exigua-Arundo donax*] (Vaghti 2003)
- 61.209.03      Narrow-leaf Willow –Dusky Willow [*Salix exigua-Salix melanopsis*] (Vaghti 2003)
  
- 61.210.00      Yellow Willow Riparian Scrub [*Salix lutea*] (Keeler-Wolf & Moore 2001)
- 61.211.00      Gooding Willow Woodland [*Salix goodingii*] (Keeler-Wolf 2001)
- 61.211.01      Gooding Willow [*Salix goodingii*] (Keeler-Wolf 2001)
  
- 61.300.00      Sycamore [*Platanus* spp.]
- \*61.310.00      California Sycamore [*Platanus racemosa*]
  
- \*61.311.00      Central California Sycamore Alluvial Woodland [*Platanus* spp.] {62100}
- \*61.311.01      California Sycamore / Slender Wildoats [*Platanus racemosa/Avena barbata*] (Keeler-Wolf *et al.* 1994)
- \*61.311.02      California Sycamore / Soft Chess [*Platanus racemosa/Bromus hordeaceus*] (Keeler-Wolf *et al.* 1994)
  
- \*61.312.00      Southern Sycamore - Alder Riparian Woodland [*Platanus* spp.-*Alnus* spp.] {62400}
- 61.312.01      California Sycamore - Coast Live Oak [*Platanus racemosa-Quercus agrifolia*] (Keeler-Wolf *et al.* 1994)
- \*61.312.02      California Sycamore [*Platanus racemosa*] (Campbell 1980)
  
- \*61.313.00      Foothill Sycamore Riparian Woodland [*Platanus* spp.]
- \*61.313.01      California Sycamore / Mulefat [*Platanus racemosa/Baccharis salicifolia*] (Keeler-Wolf *et al.* 1994)
  
- \*61.314.00      Central Coast Cottonwood - Sycamore Riparian Woodland [*Populus* spp.-*Platanus* spp.] {61210}
  
- 61.400.00      Alder Riparian Forest [*Alnus* spp.]
  
- 61.410.00      Red Alder [*Alnus rubra*]
- \*61.410.01      Douglas-fir - Red Alder / Vine Maple /Candyflower [*Pseudotsuga menziesii/Alnus rubra/Acer circinatum/Claytonia sibirica*] (Jimerson 1993)
- \*61.410.02      Red Alder / Salal [*Alnus rubra/Gaultheria shallon*] (Stuart *et al.* 1986)
- \*61.410.03      Red Alder Riparian Forest [*Alnus rubra*] {61130}
- \*61.410.04      Red Alder Forest [*Alnus rubra*]{81A00}
- \*61.410.05      Red Alder / Arroyo Willow [*Alnus rubra/Salix lasiolepis*] (Keeler-Wolf, *et al.* 2001)
- \*61.410.06      Red Alder / Salmonberry - Blue Elderberry [*Alnus rubra/Rubus spectabilis-Sambucus racemosa*] (Keeler-Wolf, *et al.* 2001)
  
- 61.420.00      White Alder Forest and Woodland [*Alnus rhombifolia*] {61510}
- \*61.420.01      White Alder / California Polypody [*Alnus rhombifolia/Polypodium californicum*] (Borchert *et al.* 1988)
- 61.420.02      White Alder / Spikenard [*Alnus rhombifolia/Aruncus dioicus*] (Jimerson 1993)
- 61.420.03      White Alder - Bigleaf Maple [*Alnus rhombifolia/Acer macrophyllum*] (Stuart *et al.* 1992)
- 61.420.04      Douglas-fir - White Alder / Himalaya Berry [*Pseudotsuga menziesii-Alnus rhombifolia/Rubus discolor*] (Stuart *et al.* 1992)

- 61.420.05 White Alder / Indian Rhubarb [*Alnus rhombifolia/Darmera peltata*] (Taylor 1975a, b)
- 61.420.06 White Alder / Miner Dogwood [*Alnus rhombifolia/Cornus sessilis*] (Taylor & Teare 1979a)
- 61.420.07 White Alder / Red Osier [*Alnus rhombifolia/Cornus sericea*] (Taylor & Teare 1979a)
- 61.420.08 White Alder / Fragrant Bedstraw [*Alnus rhombifolia/Galium trifolium*] (Taylor & Teare 1979b)
- 61.420.09 White Alder / Mulefat [*Alnus rhombifolia/Baccharis salicifolia*] (White 1994a)
- 61.420.10 White Alder [*Alnus rhombifolia*] (Potter 2000)
  
- 61.500.00 Desert Wash Riparian Woodland
  
- \*61.510.00 Mesquite Woodland [*Prosopis* spp.]
  - \*61.510.01 Mesquite Dune Scrub [*Prosopis* spp.] (Spolsky 1979)
  - \*61.510.02 Acacia - Mesquite thickets [*Acacia* spp.-*Prosopis* spp.] (Spolsky 1979)
  - \*61.510.03 Mesquite Dry Lake [*Prosopis* spp.] (Spolsky 1979)
  - \*61.510.04 Great Valley Mesquite Scrub [*Prosopis* spp.] {63420}
  - \*61.510.05 Mesquite Bosque [*Prosopis* spp.] {61820}
  - 61.510.06 Mesquite Alkaline [*Prosopis* spp.], spring type (Keeler-Wolf *et al.* 1998)
  - 61.510.07 Mesquite - Willow [*Prosopis* spp.-*Salix* spp.] (Keeler-Wolf *et al.* 1998)
  - 61.510.08 Upper Desert Mesquite [*Prosopis* spp.], spring association (Keeler-Wolf *et al.* 1998)
  
- \*61.512.00 Honey Mesquite Scrub [*Prosopis glandulosa*] (Keeler-Wolf and Thomas 2000)
  - \*61.512.01 Honey Mesquite [*Prosopis glandulosa*] (Keeler-Wolf and Thomas 2000)
  
- \*61.513.00 Tornillo Scrub [*Prosopis pubescens*] (Keeler-Wolf and Thomas 2000)
  
- \*61.520.00 Fan Palm Woodland [*Washingtonia filifera*]
  - \*61.520.01 Desert Fan Palm [*Washingtonia filifera*] {62300}
  - \*61.520.02 Fan Palm - Sycamore [*Washingtonia filifera-Platanus* spp.] (Spolsky 1979)
  
- \*61.530.00 Blue Palo Verde - Ironwood - Smoke Tree Woodland [*Cercidium floridum-Olneya tesota-Psorothamnus spinosus*]
  - \*61.530.01 Mixed Wash Woodland (Spolsky 1979)
  
- 61.540.00 Blue Palo Verde Woodland [*Cercidium floridum*]
  - \*61.540.01 Blue Palo Verde Wash Woodland [*Cercidium floridum*] (Spolsky 1979)
  - \*61.540.02 Blue Palo Verde / Desert Lavender [*Cercidium floridum/Hyptis emoryi*] (Keeler-Wolf 2001)
  
- 61.550.00 Desert-willow Woodland [*Chilopsis linearis*]
  - \*61.550.01 Desert-willow Woodland [*Chilopsis linearis*] (Spolsky 1979)
  - 61.550.02 Desert-willow / Cheesebush [*Chilopsis linearis/Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
  - \*61.550.03 Desert-willow - Desert Almond - Cheesebush [*Chilopsis linearis-Prunus fasciculata-Hymenoclea salsola*] (Keeler-Wolf and Thomas 2000)
  - 61.550.04 Desert-willow - Desert Almond [*Chilopsis linearis-Prunus fasciculata*] (Keeler-Wolf and Thomas 2000)
  - \*61.550.05 Desert-willow - Blue Sage [*Chilopsis linearis-Salvia dorrii*] (Keeler-Wolf and Thomas 2000)
  - 61.550.06 Desert-willow - Desert Sunflower [*Chilopsis linearis-Viguiera parishii*] (Keeler-Wolf and Thomas 2000)

- 61.550.07 Desert-willow - Blackstem Rabbitbrush [*Chilopsis linearis-Chrysothamnus paniculatus*] (Keeler-Wolf and Thomas 2000)
- 61.560.00 Ironwood Woodland [*Olneya tesota*]
  - \*61.560.01 Ironwood Woodland [*Olneya tesota*] (Spolsky 1979)
  - 61.560.02 Ironwood / Desert Lavender [*Olneya tesota, Hyptis emoryi*] (Keeler-Wolf 2001)
- 61.570.00 Smoke Tree Woodland and Scrub [*Psorothamnus spinosus*]
  - \*61.570.01 Smoketree Wash Woodland [*Psorothamnus spinosus*] (Spolsky 1979)
  - 61.570.02 Smoketree - Cheesebush - Sweetbush [*Psorothamnus spinosus-Hymenoclea salsola-Bebbia juncea*] (Keeler-Wolf and Thomas 2000)
  - \*61.570.03 Smoketree / California Ephedra [*Psorothamnus spinosus/Ephedra californica*] (Keeler-Wolf and Thomas 2000)
  - 61.570.04 Smoketree - Desert Lavender - Catclaw Acacia [*Psorothamnus spinosus-Hyptis emoryi-Acacia greggii*] (Keeler-Wolf and Thomas 2000)
- \*61.580.00 Desert Olive Scrub [*Forestiera pubescens*] (Keeler-Wolf and Thomas 2000)
  - \*61.580.01 Desert Olive [*Forestiera pubescens*] (Keeler-Wolf and Thomas 2000)
- \*61.800.00 Walnut [*Juglans* spp.]
- \*61.810.00 Hind's Walnut Unique Stands [*Juglans californica* var. *hindsii*] {71120}
  - \*61.810.01 Hinds Walnut/Mexican Elderberry [*Juglans hindsii/Sambucus mexicana*] (Vaghti 2003)
- 61.900.00 Mixed Riparian Forest and Woodland
- \*61.910.00 Great Valley Mixed Riparian Forest {61420}
- \*61.920.00 Southern Mixed Riparian Forest {61340}
- \*61.930.00 Southern Riparian Forest {61300}
- \*61.940.00 Mojave Riparian Forest {61700}
- 61.950.00 Desert Dry Wash Woodland {62200}
- \*61.960.00 Oregon Ash Riparian Forest [*Fraxinus latifolia*] (Keeler-Wolf, Vaghti 2000)
  - 61.960.01 Oregon Ash [*Fraxinus latifolia*] (Potter 2000)
- 63.000.00 Low to High Elevation Riparian Scrub {63000}
- 63.100.00 Scrub Willow [*Salix* spp.]
- \*63.110.00 Narrowleaf Willow [*Salix exigua*] {63410}
  - 63.110.01 Narrowleaf Willow - Desert Baccharis [*Salix exigua-Baccharis sergilloides*] (Keeler-Wolf and Thomas 2000)
- 63.111.00 Tealeaf Willow Riparian Scrub [*Salix planifolia*] (Keeler-Wolf and Moore 2001)
  - 63.111.01 Tealeaf Willow [*Salix planifolia*] (Keeler-Wolf and Moore 2001)
- 63.112.00 Sierra Willow Riparian Scrub [*Salix eastwoodiae*] (Keeler-Wolf and Moore 2001)
  - 63.112.01 Sierra Willow [*Salix eastwoodiae*] (Keeler-Wolf and Moore 2001)
- 63.113.00 Lemmon's Willow Riparian Scrub [*Salix lemmonii*] (Keeler-Wolf and Moore

- 2001)
- 63.113.01 Lemmon's Willow [*Salix lemmonii*] (Keeler-Wolf and Moore 2001)
- 63.114.00 Dusky Willow Riparian Scrub [*Salix melanopsis*] (Keeler-Wolf and Moore 2001)
- 63.114.01 Dusky Willow [*Salix melanopsis*] (Keeler-Wolf and Moore 2001)
- 63.115.00 Grayleaf Sierra Willow Riparian Scrub [*Salix orestera*] (Taylor 1984)
- 63.115.01 Grayleaf Sierra Willow / Shorthair Reedgrass [*Salix orestera/Calamagrostis breweri*] (Taylor 1984)
- 63.115.02 Grayleaf Sierra Willow / Arrowhead Butterweed [*Salix orestera/Senecio triangularis*] (Taylor and Major & Taylor 1977)
- 63.116.00 Arctic Willow Dwarf Scrub [*Salix arctica*] (Keeler-Wolf and Moore 2001)
- \*63.116.01 Arctic Willow [*Salix arctica*] (Taylor 1984) {moved from 91.120.22}
- 63.116.02 Arctic Willow / Shorthair Reedgrass - Sierra Bilberry - Pussytoes [*Salix arctica/Calamagrostis breweri-Vaccinium caespitosum-Antennaria media*] (Keeler-Wolf and Moore 2001)
- \*63.117.00 Snow Willow Dwarf Scrub [*Salix reticulata*] (Keeler-Wolf and Moore 2001)
- 63.120.00 Sandbar Willow [*Salix sessifolia*]
- \*63.130.00 Southern Willow [*Salix* spp.] {63320}
- \*63.140.00 Great Valley Willow [*Salix* spp.]
- \*63.150.00 Montane Wetland Shrub Habitat
- \*63.160.00 Subalpine Wetland Shrub Habitat
- 63.160.01 Sierra Ragwort - Showy Sedge [*Senecio scorzonella-Carex spectabilis*] (Burke 1982)
- \*63.160.02 Sierra Willow / Arrowhead Butterweed [*Salix eastwoodiae/Senecio triangularis*] (Major & Taylor 1977)
- \*63.160.03 Grayleaf Willow - Meadow Onion [*Salix orestera-Allium validum*] (Taylor 1984)
- \*63.160.04 Grayleaf Willow - Shorthair [*Salix orestera-Carex filifolia*] (Taylor 1984)
- \*63.160.05 Mountain Spiraea [*Spiraea densiflora*] (Taylor 1984)
- \*63.160.06 Tealeaf Willow - Showy Sedge [*Salix planifolia-Carex spectabilis*] (Taylor 1984)
- 63.200.00 Alder Scrubs [*Alnus* spp.]
- \*63.210.00 Mountain Alder Scrub [*Alnus incana*] {63500}
- \*63.220.00 Sitka Alder Scrub [*Alnus viridis*]
- \*63.300.00 Buttonbush Scrub [*Cephalanthus occidentalis*] {63430}
- 63.400.00 Elderberry Scrub and Savanna [*Sambucus* spp.]
- 63.410.00 Mexican Elderberry [*Sambucus mexicana*]
- \*63.410.01 Elderberry Savanna [*Sambucus mexicana*] {63440}
- 63.510.00 Mulefat Scrub [*Baccharis salicifolia*] {63310}

- 63.520.00 Emory Baccharis Scrub [*Baccharis emoryi*]
- \*63.530.00 Broom Baccharis Scrub [*Baccharis sergiloides*]
  - \*63.530.01 Broom Baccharis - Desert Almond [*Baccharis sergiloides-Prunus fasciculata*] (Keeler-Wolf and Thomas 2000)
  - \*63.530.02 Broom Baccharis - Desert Almond - Skunkbrush [*Baccharis sergiloides-Prunus fasciculata-Rhus trilobata*] (Keeler-Wolf and Thomas 2000)
  - \*63.530.03 Broom Baccharis / Deergrass [*Baccharis sergiloides/Muhlenbergia rigens*] (Keeler-Wolf and Thomas 2000)
- 63.600.00 Birch Scrub [*Betula* spp.]
- \*63.610.00 Water Birch Scrub [*Betula occidentalis*] {63510}
- 63.700.00 Arrow Weed Scrubs [*Pluchea* spp.] {63820}
- 63.710.00 Arrow Weed Scrub [*Pluchea sericea*]
- 63.800.00 Vegetation dominated by Tamarisk [*Tamarix* spp.] {63810}
- 63.810.00 Tamarisk Scrubs and Woodlands [*Tamarix* spp.]
  - 63.810.01 Athel Tamarisk [*Tamarix aphylla*] type
  - 63.810.02 Shrub Tamarisk [*Tamarix* spp.] type
- \*63.900.00 Southern Riparian Scrub {63300}
- 63.901.00 North Coast Riparian Scrub {63100}
- 63.902.00 Central Coast Riparian Scrub {63200}
- 63.903.00 Montane Riparian Scrub {63500}
- 63.904.00 Modoc-Great Basin Riparian Scrub {63600}
- 63.905.00 Mojave Desert Wash Scrub {63700}
- 63.906.00 Himalayan Blackberry Scrub [*Rubus discolor*] (Keeler-Wolf, Vaghti 2000)
- 63.907.00 California Rose Riparian Scrub [*Rosa californica*] (Keeler-Wolf, Vaghti 2000)
  - 63.907.01 Rose / Baccharis Scrub [*Rosa* spp. / *Baccharis* spp.] (Keeler-Wolf, Vaghti 2000)
- 63.908.00 Salmonberry Scrub [*Rubus spectabilis*] (Keeler-Wolf, *et al.* 2001)

70.000.00 BROAD LEAFED UPLAND TREE DOMINATED

71.000.00 Oak Woodlands and Forests

- 71.010.00 Black Oak Forests and Woodland [*Quercus kelloggii*]
  - 71.010.01 Black Oak - Canyon Live Oak / Poison-oak [*Quercus kelloggii-Quercus chrysolepis/Toxicodendron diversilobum*] (Allen *et al.* 1991)
  - \*71.010.02 Black Oak - Coast Live Oak - Pine / Ocean Spray [*Quercus kelloggii-Quercus chrysolepis/Holodiscus discolor*] (Allen *et al.* 1991)
  - 71.010.03 Black Oak / Deerbush [*Quercus kelloggii/Ceanothus integerrimus*] (Allen *et al.* 1991)

- 71.010.04 Black Oak / Deerbush - Poison-oak / Bracken [*Quercus kelloggii/Ceanothus integerrimus-Toxicodendron diversilobum/Pteridium aquilinum*] (Allen *et al.* 1991)
- 71.010.05 Black Oak / Grass [*Quercus kelloggii/Trieleia* spp.] (Allen *et al.* 1991)
- 71.010.06 Black Oak / Greenleaf Manzanita [*Quercus kelloggii/Arctostaphylos patula*] (Allen *et al.* 1991)
- \*71.010.07 Black Oak - Madrone - Coast Live Oak [*Quercus kelloggii-Arbutus menziesii-Quercus chrysolepis*] (Allen *et al.* 1991)
- 71.010.08 Black Oak / Poison-oak [*Quercus kelloggii/Toxicodendron diversilobum*] (Allen *et al.* 1991)
- 71.010.09 Black Oak / Poison-oak / Grass [*Quercus kelloggii/Toxicodendron diversilobum/Trieleia* spp.] (Allen *et al.* 1991)
- 71.010.10 Black Oak / Poison-oak - StyraX / Grass Nut [*Quercus kelloggii/Toxicodendron diversilobum-Styryx officinalis/Trieleia laxa*] (Allen *et al.* 1991)
- \*71.010.11 Black Oak - Valley Oak [*Quercus kelloggii-Quercus lobata*] (Allen *et al.* 1991)
- 71.010.12 Canyon Live Oak - Black Oak [*Quercus chrysolepis-Quercus kelloggii*] (Allen *et al.* 1991)
- 71.010.13 Mixed Oak - Coast Live Oak / Poison-oak [*Quercus* spp.-*Quercus agrifolia/Toxicodendron diversilobum*] (Allen *et al.* 1991)
- 71.010.14 Coulter Pine - Black Oak [*Pinus coulteri-Quercus kelloggii*] (Keeler-Wolf 1986b, 1990b)
- 71.010.15 Black Oak [*Quercus kelloggii*] (Keeler-Wolf 1987f)
- 71.010.16 Black Oak - Douglas-fir - Bigleaf Maple [*Quercus kelloggii-Pseudotsuga menziesii-Acer macrophyllum*] (Jimerson 1993)
- \*71.010.17 Black Oak - Douglas-fir [*Quercus kelloggii-Pseudotsuga menziesii*] (Wainwright & Barbour 1984)
- 71.010.18 Black Oak Woodland [*Quercus kelloggii*] {71120}
- 71.010.19 Black Oak Forest [*Quercus kelloggii*] {81340}
- 71.010.20 Black Oak / Mewuk Manzanita / Mountain Misery [*Quercus kelloggii/Arctostaphylos mewukka/Chamaebatia foliosa*] (Keeler-Wolf and Moore 2001)
- 71.010.21 Black Oak - Incense Cedar [*Quercus kelloggii-Calocedrus decurrens*] (Keeler-Wolf and Moore 2001)
- 71.020.00 Blue Oak Woodland [*Quercus douglasii*] {71140}
- 71.020.01 Blue Oak - Coast Live Oak / Grass [*Quercus douglasii-Quercus agrifolia/Grass*] (Allen *et al.* 1991)
- 71.020.02 Blue Oak - Foothill Pine / Grass [*Quercus douglasii-Pinus sabinana/Grass*] (Allen *et al.* 1991)
- 71.020.03 Blue Oak - Foothill Pine / Wedgeleaf Ceanothus - Birchleaf Mountain-mahogany [*Quercus douglasii-Pinus sabinana/Ceanothus cuneatus-Cercocarpus betuloides*] (Allen *et al.* 1991)
- 71.020.04 Blue Oak - Foothill Pine / Whiteleaf Manzanita / Grass [*Quercus douglasii-Pinus sabinana/Arctostaphylos viscida/Grass*] (Allen *et al.* 1991)
- 71.020.05 Blue Oak / Grass [*Quercus douglasii/Grass*] (Allen *et al.* 1991) (Includes Blue Oak / Bajada Lupine - Tree Clover, [*Quercus douglasii/Lupinus concinnus-Trifolium ciliolatum*], Blue Oak / Blue Larkspur-California Phacelia, [*Quercus douglasii/Delphinium parryi- Phacelia californica*], Blue Oak / Blue-eyed Mary-Rigiopappus, [*Quercus douglasii/Collinsia sparsiflora-Rigiopappus leptocladus*], Blue Oak / Chile Lotus - Purple Needlegrass, [*Quercus douglasii/Lotus wrangelianus-Stipa pulchra*], Blue Oak / Common Fiddleneck - Rusty Popcorn Flower, [*Quercus douglasii/Amsinckia intermedia-Plagiobothrys nothofulvus*], Blue Oak / Foxtail - Johnny-jump-up, [*Quercus douglasii/Hordeum leporinum-Viola*])

- pedunculata*], Blue Oak / Phloxleaf Bedstraw - Bajada Lupine, [*Quercus douglasii*/*Galium andrewsii*-*Lupinus concinnus*], Blue Oak / Wand Buckwheat / Chile Lotus - California Plantain, [*Quercus douglasii*/*Eriogonum elongatum*/*Lotus wrangelianus*-*Plantago erecta*], Blue Oak / Wart Spurge - Goldenback Fern, [*Quercus douglasii*/*Euphorbia spathulata*-*Pentagramma triangularis*], Blue Oak / Whitestem Filaree - Foxtail, [*Quercus douglasii*/*Erodium moschatum*-*Hordeum leporinum*], of Borchert *et al.* 1993a, *Quercus douglasii* (and Blue Oak/Lemmon Needlegrass of Newton 1987) [*Quercus douglasii*/*Stipa lemmonii*]
- 71.020.06 Blue Oak - Interior Live Oak / Grass [*Quercus douglasii*-*Quercus wislizeni*/Grass] (Allen *et al.* 1991) (Includes Blue Oak - Interior Live Oak / Mission Star [*Quercus douglasii*-*Quercus wislizeni*/*Lithophragma cymbalaria*] of Borchert *et al.* 1993a)
- 71.020.07 Blue Oak - Interior Live Oak / Wedgeleaf Ceanothus /Grass [*Quercus douglasii*-*Quercus wislizeni*/*Ceanothus cuneatus*] (Allen *et al.* 1991)
- 71.020.08 Blue Oak - Linearleaf Goldenbush [*Quercus douglasii*-*Ericameria linearifolia*] (Allen *et al.* 1991)
- 71.020.09 Blue Oak - Understory Oak / Grass [*Quercus douglasii*-*Quercus spp.*/Grass] (Allen *et al.* 1991)
- \*71.020.10 Blue Oak - Valley Oak - Coast Live Oak / Grass [*Quercus douglasii*-*Quercus lobata*-*Quercus agrifolia*/Grass] (Allen *et al.* 1991)
- 71.020.11 Blue Oak - Valley Oak / Grass [*Quercus douglasii*-*Quercus lobata*/Grass] (Allen *et al.* 1991)
- 71.020.12 Blue Oak / Wedgeleaf Ceanothus / Grass [*Quercus douglasii*/*Ceanothus cuneatus*/Grass] (Allen *et al.* 1991)
- 71.020.13 Interior Live Oak - Blue Oak - Foothill Pine / Grass [*Quercus wislizeni*-*Quercus douglasii*-*Pinus sabiniana*/Grass] (Allen *et al.* 1991)
- \*71.020.14 Blue Oak / Birchleaf Mountain-mahogany / Bowlesia [*Quercus douglasii*/*Cercocarpus betuloides*/*Bowlesia incana*] (Borchert *et al.* 1993a)
- 71.020.15 Blue Oak / Hillside Gooseberry / Ripgut Brome [*Quercus douglasii*/*Ribes californica*/*Bromus diandrus*] (Borchert *et al.* 1993a)
- 71.020.16 Blue Oak / Non-native Bromegrass - Wild Carrot [*Quercus douglasii*/*Bromus sp.*- *Daucus pusillus*] (Keeler-Wolf and Moore 2001)
- 71.020.17 Blue Oak - Interior Live Oak / Non-native Bromegrass - Wild Carrot [*Quercus douglasii*-*Quercus wislizeni*/*Bromus sp.*- *Daucus pusillus*] (Keeler-Wolf and Moore 2001)
- \*71.030.00 Oregon White Oak Woodland [*Quercus garryana* var. *garryana*]
- \*71.030.01 Oregon White Oak - Black Oak / Tall-oatgrass [*Quercus garryana* var. *garryana*-*Quercus kelloggii*/*Arrhenatherum elatius*] (Jimerson 1993)
- \*71.030.02 Oregon White Oak - Brewer Oak / California Fescue [*Quercus garryana* var. *garryana*-*Quercus garryana* var. *breweri*/*Festuca californica*] (Jimerson 1993)
- \*71.030.03 Oregon White Oak - Douglas-fir / California Fescue [*Quercus garryana* var. *garryana*-*Pseudotsuga menziesii*/*Festuca californica*] (Jimerson 1993)
- \*71.030.04 Oregon White Oak / Poison-oak [*Quercus garryana* var. *garryana*/*Toxicodendron diversilobum*] (Leitner & Leitner 1988)
- \*71.030.05 Oregon White Oak / Common Snowberry [*Quercus garryana* var. *garryana*/*Symphoricarpos albus*] (1987)
- \*71.030.06 Oregon White Oak / Dogtail [*Quercus garryana* var. *garryana*/*Cynosurus cristatus*] (Sugihara *et al.* 1987)
- \*71.030.07 Oregon White Oak / Klamath Gooseberry [*Quercus garryana* var. *garryana*/*Ribes roezlii*] (Sugihara *et al.* 1987)

- \*71.030.08 Oregon White Oak / Mock-orange [*Quercus garryana* var. *garryana/Philadelphus lewisii*] (Sugihara *et al.* 1987)
- \*71.030.09 Oregon White Oak / Poison Larkspur [*Quercus garryana* var. *garryana/Delphinium trollifolium*] (Sugihara *et al.* 1987)
- \*71.030.10 Oregon White Oak / Orchid Grass [*Quercus garryana* var. *garryana/Dactylis glomerata*] (Sugihara *et al.* 1987)
- \*71.030.11 Oregon White Oak / California Brome [*Quercus garryana* var. *garryana/Bromus californica*] (Taylor and Teare 1979a)
- 71.030.12 Oregon Oak Woodland [*Quercus garryana* var. *garryana*] {71110}
  
- \*71.040.00 Valley Oak Forests and Woodlands [*Quercus lobata*] {61430}
- \*71.040.01 Black Oak - Valley Oak / Grass [*Quercus kelloggii-Quercus lobata/Grass*] (Allen *et al.* 1991a)
- \*71.040.02 Blue Oak - Valley Oak / Grass [*Quercus douglasii-Quercus lobata/Grass*] (Allen *et al.* 1991a)
- \*71.040.03 Coast Live Oak - Valley Oak / Poison-oak [*Quercus agrifolia-Quercus lobata/Toxicodendron diversilobum*] (Allen *et al.* 1991a)
- \*71.040.04 Mixed Oak - Valley Oak / Poison-oak - California Coffeeberry [*Quercus* spp.- *Quercus lobata/Toxicodendron diversilobum-Rhamnus californica*] (Allen *et al.* 1991a)
- \*71.040.05 Valley Oak / Grass [*Quercus lobata/Grass*] (Allen *et al.* 1991a)
- \*71.040.06 Valley Oak - Coast Live Oak / Grass [*Quercus lobata-Quercus agrifolia/Grass*] (Allen *et al.* 1991a)
- \*71.040.07 Great Valley Valley Oak Riparian [*Quercus lobata*] {61430} (Vaghti 2003 as *Q lobata/Aristolochia californica*)
- \*71.040.08 Valley Oak Woodland [*Quercus lobata*] {71130}
  
- 71.050.00 Canyon Live Oak Forest and Woodland [*Quercus chrysolepis*]
- 71.050.01 Canyon Live Oak - Madrone - Tanoak [*Quercus chrysolepis-Arbutus menziesii-Lithocarpus densiflora*] (Campbell 1980)
- \*71.050.02 Sugar Pine - Canyon Live Oak [*Pinus lambertiana-Quercus chrysolepis*] (Griffin 1976a)
- \*71.050.03 Canyon Live Oak - Deerbrush [*Quercus chrysolepis-Ceanothus integerrimus*] (Gordon & White 1994)
- 71.050.04 Canyon Live Oak Woodland [*Quercus chrysolepis*] (Meier 1979)
- 71.050.05 Canyon Live Oak - Douglas-fir [*Quercus chrysolepis-Pseudotsuga menziesii*] (Mize 1973)
- \*71.050.06 Canyon Live Oak / Lemmon Catchfly [*Quercus chrysolepis/Silene lemmonii*] (NDDDB)
- \*71.050.07 Canyon Live Oak- Oregon White Oak / Goldenback Fern [*Quercus chrysolepis-Quercus garryana* var. *garryana/Pentagramma triangularis*] (Sawyer & Stillman 1977)
- 71.050.08 Canyon Live Oak / Narrowleaf Sword Fern [*Quercus chrysolepis/Polystichum imbricans*] (Sawyer & Stillman 1977)
- 71.050.09 Canyon Live Oak / Mewuk Manzanita [*Quercus chrysolepis/Arctostaphylos mewukka*] (Taylor & Randal 1977a)
- 71.050.10 Moved to Douglas-fir – Canyon Live oak alliance
- 71.050.11 Canyon Live Oak [*Quercus chrysolepis*] Ravine forest (Holland 1986) {61350}
- 71.050.12 Canyon Live Oak Forest [*Quercus chrysolepis*] {81320}
- 71.050.13 Canyon Live Oak - California Bay [*Quercus chrysolepis-Umbellularia californica*] (Keeler-Wolf and Moore 2001)
- 71.050.14 Canyon Live Oak / Whiteleaf Manzanita [*Quercus chrysolepis-Arctostaphylos viscida*] (Keeler-Wolf and Moore 2001)
- 71.050.15 Canyon Live Oak / Greenleaf Manzanita [*Quercus chrysolepis/Arctostaphylos patula*] (Keeler-Wolf and Moore 2001)

- 71.050.16 Canyon Live Oak - Foothill Pine [*Quercus chrysolepis*/*Pinus sabiniana*] (Keeler-Wolf and Moore 2001)
- 71.050.17 Canyon Live Oak / Wood Fern [*Quercus chrysolepis*/*Dryopteris arguta*] (Keeler-Wolf and Moore 2001)
- 71.050.18 Canyon Live Oak - Ponderosa Pine [*Quercus chrysolepis*/*Pinus ponderosa*] (Keeler-Wolf and Moore 2001)
- 71.050.19 Canyon Live Oak - Incense Cedar [*Quercus chrysolepis*/*Calocedrus decurrens*] (Keeler-Wolf and Moore 2001)
- 71.060.00 Coast Live Oak Forest and Woodland [*Quercus agrifolia*]
- 71.060.01 Blue Oak - Coast Live Oak / Grass [*Quercus douglasii*-*Quercus agrifolia*/Grass] (Allen *et al.* 1991)
- 71.060.02 Coast Live Oak [*Quercus agrifolia*] (Allen *et al.* 1991)
- 71.060.03 Coast Live Oak - Bigleaf Maple / California Coffeeberry -Ocean Spray [*Quercus agrifolia*-*Acer macrophyllum*/*Rhamnus californica*-*Holodiscus discolor*] (Allen *et al.* 1991)
- 71.060.04 Coast Live Oak / Blackberry / Bracken [*Quercus agrifolia*/*Rubus* spp./*Pteridium aquilinum*] (Allen *et al.* 1991)
- 71.060.05 Coast Live Oak - California Bay / Toyon - Scrub Oak [*Quercus agrifolia*-*Umbellularia californica*/*Heteromeles arbutifolia*-*Quercus berberidifolia*] (Allen *et al.* 1991)
- 71.060.06 Coast Live Oak / California Coffeeberry - Toyon [*Quercus agrifolia*/*Rhamnus californica*-*Heteromeles arbutifolia*] (Allen *et al.* 1991)
- 71.060.07 Coast Live Oak / Chamise - Black Sage [*Quercus agrifolia*/*Adenostoma fasciculatum*-*Salvia mellifera*] (Allen *et al.* 1991)
- 71.060.08 Coast Live Oak / California Sagebrush / Grass [*Quercus agrifolia*/*Artemisia californica*/Grass] (Allen *et al.* 1991)
- 71.060.09 Coast Live Oak / Grass [*Quercus agrifolia*/Grass] (Allen *et al.* 1991)
- 71.060.10 Coast Live Oak - Madrone / Hazel - Blackberry [*Quercus agrifolia*-*Arbutus menziesii*/*Corylus cornuta*-*Rubus* spp.] (Allen *et al.* 1991)
- 71.060.11 Coast Live Oak / Ocean Spray - Common Snowberry [*Quercus agrifolia*/*Holodiscus discolor*-*Symphoricarpos albus*] (Allen *et al.* 1991)
- 71.060.12 Coast Live Oak / Poison-oak / Grass [*Quercus agrifolia* / *Toxicodendron diversilobum*/Grass] (Allen *et al.* 1991)
- 71.060.13 Coast Live Oak / Poison-oak [*Quercus agrifolia*/*Toxicodendron diversilobum*] (Allen *et al.* 1991)
- 71.060.14 Coast Live Oak / Toyon / Grass [*Quercus agrifolia*/*Heteromeles arbutifolia*/Grass] (Allen *et al.* 1991)
- 71.060.15 Coast Live Oak / Toyon - Poison-oak [*Quercus agrifolia*/*Heteromeles arbutifolia*-*Toxicodendron diversilobum*] (Allen *et al.* 1991)
- 71.060.16 Coast Live Oak / Hairyleaf Ceanothus [*Quercus agrifolia*/*Ceanothus oliganthus*] (Gordon & White 1994)
- 71.060.17 Coast Live Oak /Common Snowberry [*Quercus agrifolia*/*Symphoricarpos albus*] (Keeler-Wolf 1994)
- \*71.060.18 Coast Live Oak - Black Oak [*Quercus agrifolia*-*Quercus kelloggii*] (Wainwright & Barbour 1984)
- 71.060.19 Coast Live Oak Woodland [*Quercus agrifolia*] {71160}
- \*71.060.20 Southern Coast Live Oak Riparian Forest [*Quercus agrifolia*] {61310}
- 71.060.21 Central Coast Live Oak Forest [*Quercus agrifolia*] {61220}
- 71.060.22 Coast Live Oak/Wright's Buckwheat [*Quercus agrifolia*/*Eriogonum wrightii*]
- 71.060.23 Coast Live Oak-Coulter Pine [*Quercus agrifolia*-*Pinus coulteri*]
- 71.060.24 Coast Live Oak - (Madrone) - California Bay [*Quercus agrifolia*-*(Arbutus menziesii)*-*Umbellularia californica*] (Keeler-Wolf, *et al.* 2001)

- 71.060.25 Coast Live Oak / Poison Oak - (Hazel) [*Quercus agrifolia*/*Toxicodendron diversilobum*-(*Corylus cornuta*)] (Keeler-Wolf, et al. 2001)
- \*71.070.00 Engelmann Oak Woodland [*Quercus engelmannii*]  
 \*71.070.01 Open Engelmann Oak Woodland [*Quercus engelmannii*] {71181}
- 71.080.00 Interior Live Oak Woodland [*Quercus wislizeni*]  
 71.080.01 Interior Live Oak - Blue Oak - Foothill Pine [*Quercus wislizeni-Quercus douglasii-Pinus sabiniana*] (Allen et al. 1991)  
 71.080.02 Interior Live Oak - Foothill Pine / Common Manzanita [*Quercus wislizeni-Pinus sabiniana/Arctostaphylos manzanita*] (Allen et al. 1991)  
 71.080.03 Interior Live Oak - Madrone / Poison-oak [*Quercus wislizeni-Arbutus menziesii/Toxicodendron diversilobum*] (Allen et al. 1991)  
 71.080.04 Interior Live Oak / Whiteleaf Manzanita [*Quercus wislizeni/Arctostaphylos viscida*] (Allen et al. 1991)  
 71.080.05 Interior Live Oak / Yerba Santa / Grass [*Quercus wislizeni/Eriodictyon californicum/Grass*] (Allen et al. 1991)  
 71.080.06 Interior Live Oak Woodland [*Quercus wislizeni*] {71150}  
 71.080.07 Interior Live Oak Forest [*Quercus wislizeni*] {81330}
- \*71.090.00 Island Oak Woodland [*Quercus tomentella*] {71190}
- 71.095.00 Shrub Live Oak Scrub [*Quercus turbinella*]  
 71.095.01 Shrub Live Oak - Singleleaf Pinyon [*Quercus turbinella-Pinus monophylla*] (Keeler-Wolf and Thomas 2000)  
 71.095.02 Shrub Live Oak - Desert Baccharis [*Quercus turbinella-Baccharis sergiloides*] (Keeler-Wolf and Thomas 2000)
- 71.100.00 Mixed Oak Woodland and Forest [*Quercus* spp.]  
 71.100.01 Black Oak - Valley Oak / Grass [*Quercus kelloggii-Quercus lobata/Grass*] (Allen et al. 1991)  
 71.100.02 Black Oak - Valley Oak - Coast Live Oak / Grass [*Quercus kelloggii-Quercus lobata-Quercus agrifolia/Grass*] (Allen et al. 1991)  
 71.100.03 Interior Live Oak / Toyon [*Quercus wislizeni/Heteromeles arbutifolia*] (Allen et al. 1991)  
 71.100.04 Mixed Oak - Black Oak / Grass [*Quercus* spp.-*Quercus kelloggii/Grass*] (Allen et al. 1991)  
 71.100.05 Mixed Oak - California Buckeye / Grass [*Quercus* spp.-*Aesculus californica/Grass*] (Allen et al. 1991)  
 71.100.06 Mixed Oak - Coast Live Oak / Poison-oak [*Quercus* spp.-*Quercus agrifolia/Toxicodendron diversilobum*] (Allen et al. 1991)  
 71.100.07 Mixed Oak - Foothill Pine / Grass [*Quercus* spp.-*Pinus sabiniana/Grass*] (Allen et al. 1991)  
 71.100.08 Mixed Oak / Grass [*Quercus* spp./Grass] (Allen et al. 1991)  
 71.100.09 Mixed Oak - Interior Live Oak - Foothill Pine [*Quercus* spp.-*Quercus wislizeni-Pinus sabiniana*] (Allen et al. 1991)  
 71.100.10 Mixed Oak / Poison-oak - Coyote Brush [*Quercus* spp./*Toxicodendron diversilobum-Baccharis pilularis*] (Allen et al. 1991)  
 71.100.11 Mixed Oak - Valley Oak / Poison-oak - California Coffeeberry [*Quercus* spp.-*Quercus lobata/Toxicodendron diversilobum-Rhamnus californica*] (Allen et al. 1991)  
 71.100.12 Oregon White Oak - Black Oak / Firecracker Flower [*Quercus garryana* var. *garryana-Quercus kelloggii/Dichelostemma ida-maia*] (Jimerson 1993)  
 71.100.13 Oregon White Oak - Black Oak / Tall-oatgrass [*Quercus garryana* var. *garryana-Quercus kelloggii/Arrhenatherum elatius*] (Jimerson 1993)

- 72.000.00 Upland Walnut Woodlands and Forests [*Juglans* spp.]
  - 72.100.00 California Walnut Woodland and Forests [*Juglans californica* var. *californica*]
    - \*72.100.01 California Walnut Woodland [*Juglans californica* var. *californica*] {71210}
    - \*72.100.02 California Walnut Forest [*Juglans californica* var. *californica*] {81600}
- 73.000.00 Tanoak Forest and Woodland
  - 73.100.00 Tanoak Forest and Woodland [*Lithocarpus densiflora*] {81400}
    - 73.100.01 Sugar Pine - Tanoak / Poison-oak [*Pinus lambertina*-*Lithocarpus densiflora*/*Toxicodendron diversilobum*] (Griffin 1976)
    - 73.100.02 Tanoak / California Coffeeberry [*Lithocarpus densiflora*/*Rhamnus californica*] (Sawyer 1981a)
- 73.200.00 Pacific Madrone [*Arbutus menziesii*] (Keeler-Wolf, et al. 2001)
- \*74.000.00 California Bay Forests and Woodlands [*Umbellularia californica*]
  - 74.100.00 California Bay Forest and Woodland [*Umbellularia californica*] {81200}
    - 74.100.01 California Bay [*Umbellularia californica*] (Campbell 1980)
    - 74.100.02 Tanoak - California Bay [*Lithocarpus densiflora*-*Umbellularia californica*] (Fiedler & Leidy 1987)
    - 74.100.03 California Bay - Madrone [*Umbellularia californica*-*Arbutus menziesii*] (Parker 1990)
    - 74.100.04 California Bay - Blue Elderberry / Western Sword Fern [*Umbellularia californica*-*Sambucus racemosa*/*Polystichum munitum*] (Keeler-Wolf, et al. 2001)
    - 74.100.05 California Bay - Coast Live Oak / Poison Oak - Hazelnut [*Umbellularia californica*-*Quercus agrifolia*/*Toxicodendron diversilobum*-*Corylus cornuta*] (Keeler-Wolf, et al. 2001)
- 75.000.00 California Buckeye Woodland [*Aesculus californica*]
  - \*75.100.00 California Buckeye Woodland [*Aesculus californica*]
- 76.000.00 *Cercocarpus*-Mountain Mahogany Woodlands and Scrubs [*Cercocarpus* spp.]
  - 76.100.00 Birchleaf Mountain-Mahogany Scrub [*Cercocarpus betuloides*]
    - 76.100.01 Klamath Birchleaf Mountain-mahogany [*Cercocarpus* spp.] (Taylor 1979a)
    - 76.100.02 Peninsular Range Birchleaf Mountain-mahogany [*Cercocarpus* spp.] (Gordon & White 1994)
    - 76.100.03 Birchleaf Mountain Mahogany with Scrub
    - 76.100.04 Birchleaf Mountain-mahogany-Bigberry Manzanita
  - 76.200.00 Curlleaf Mountain-Mahogany Woodland and Scrub [*Cercocarpus ledifolius*]
    - 76.200.01 Curlleaf Mountain-Mahogany - Big Sagebrush [*Cercocarpus ledifolius*-*Artemisia tridentata*] (Keeler-Wolf and Thomas 2000)
    - 76.200.02 Curlleaf Mountain-Mahogany / Roundleaf Snowberry [*Cercocarpus ledifolius*/*Symphoricarpos rotundifolia*] (Keeler-Wolf and Thomas 2000)
  - \*76.300.00 Littleleaf Mountain-Mahogany Scrub [*Cercocarpus intricatus*] (Keeler-Wolf and Thomas 2000)
- \*77.000.00 Catalina Ironwood Woodland Unique Stands [*Lyonothamnus floribundus*] {81700}

- \*78.000.00 Hollyleaf Cherry Woodland and Scrub Unique Stands [*Prunus ilicifolia*]
- \*78.100.00 Island Hollyleaf Cherry [*Prunus ilicifolia* ssp. *lyonii*] {81810}
- \*78.200.00 ~~Mainland Hollyleaf Cherry~~ [*Prunus ilicifolia* ssp. *ilicifolia*] {81820} entry obsolete; moved to 37.910.00
- 79.000.00 Eucalyptus Naturalized Forest [*Eucalyptus* spp.]
- 80.000.00 CONIFEROUS UPLAND FOREST AND WOODLAND
- 81.000.00 Cypress Scrubs, Woodlands and Forests [*Cupressus* spp.]
  - \*81.100.00 Port Orford-cedar Forest [*Chamaecyparis lawsoniana*] {82500}
    - \*81.100.01 Port Orford-cedar / Western Azalea [*Chamaecyparis lawsoniana/Rhododendron occidentale*] (Jimerson 1994)
    - \*81.100.02 Port Orford-cedar - Douglas-fir / Huckleberry Oak [*Chamaecyparis lawsoniana-Pseudotsuga menziesii/Quercus vaccinifolia*] (Jimerson 1994)
    - \*81.100.03 Port Orford-cedar - Shasta Fir / Sadler Oak - Thinleaf Huckleberry [*Chamaecyparis lawsoniana-Abies magnifica* var. *shastensis/Quercus sadleriana-Vaccinium membranaceum*] (Jimerson 1994)
    - \*81.100.04 Port Orford-cedar / Rhododendron - Salal [*Chamaecyparis lawsoniana/Rhododendron macrophyllum-Gaultheria shallon*] (Jimerson 1994)
    - \*81.100.05 Port Orford-cedar / Salal [*Chamaecyparis lawsoniana/Gaultheria shallon*] (Jimerson 1994)
    - \*81.100.06 Port Orford-cedar - White Fir / Azalea [*Chamaecyparis lawsoniana-Abies concolor/Rhododendron* spp.] (Jimerson 1994)
    - \*81.100.07 Port Orford-cedar - White Fir / Sadler Oak [*Chamaecyparis lawsoniana-Abies concolor/Quercus sadleriana*] (Jimerson 1994)
    - \*81.100.08 Port Orford-cedar - White Fir / Herb [*Chamaecyparis lawsoniana-Abies concolor/Herb*] (Jimerson 1994)
    - \*81.100.09 Port Orford-cedar - White Fir / Huckleberry Oak [*Chamaecyparis lawsoniana-Abies concolor/Quercus vaccinifolia*] (Jimerson 1994)
    - \*81.100.10 Port Orford-cedar - Western White Pine / Huckleberry Oak [*Chamaecyparis lawsoniana-Pinus monticola/Quercus vaccinifolia*] (Jimerson 1994)
    - \*81.100.11 Moved to Douglas-fir – Tanoak Alliance
    - \*81.100.12 Moved to Douglas-fir – Tanoak Alliance
    - \*81.100.13 Moved to Douglas-fir – Tanoak Alliance
    - \*81.100.14 Moved to Douglas-fir – Tanoak Alliance
    - \*81.100.15 Tanoak - Port Orford-cedar / Spikenard [*Lithocarpus densiflora-Chamaecyparis lawsoniana/Aruncus diocus*] (Jimerson 1994)
    - \*81.100.16 Moved to Douglas-fir – Tanoak Alliance)
    - \*81.100.17 Port Orford-cedar -Pine / Rhododendron [*Pinus* spp./*Rhododendron* spp.] (Simpson 1980)
    - \*81.100.18 Port Orford-cedar -Douglas-fir / Spicebush [*Chamaeaparis lawsoniana-Pseudotsuga menziesii/Calycanthus occidentalis*] (Jimerson et al. 1999)
    - \*81.100.19 Port Orford-cedar - Mixed conifer/Western Azalea – dwarf tanbark oak [*Chamaeaparis lawsoniana-Abies concolor-Calocedrus decurrens/Rhododendron occidentale-Lithocarpus densiflorus* var. *echinoides*] (Jimerson et al. 1999)
    - \*81.100.20 Port Orford-cedar - White fir /Sitka alder [*Chamaeaparis lawsoniana-Abies concolor/Alnus sinuata*] (Jimerson et al. 1999)

- \*81.100.21 Port Orford-cedar - White fir /Vine maple [*Chamaeopsis lawsoniana*-*Abies concolor*/*Acer circinatum*] (Jimerson et al. 1999)
- \*81.100.22 Port Orford-cedar - Brewer spruce/Sadler oak-Huckleberry oak [*Chamaeopsis lawsoniana*-*Picea breweriana*/*Quercus sadleriana*-*Quercus vaccinifolia*] (Jimerson et al. 1999)
- \*81.100.23 Port Orford-cedar – Shasta Red Fir/Sitka Alder-Sadler Oak [*Chamaeopsis lawsoniana*-*Abies magnifica* ssp. *Shastensis*/*Alnus sinuata*-*Quercus sadleriana*] (Jimerson et al. 1999)
- \*81.100.24 Port Orford-cedar – Shasta Red Fir/Sitka Alder/California Pitcher Plant [*Chamaeopsis lawsoniana*-*Abies magnifica* ssp. *shastensis*/*Alnus sinuata*/*Darlingtonia californica*] (Jimerson et al. 1999)
- \*81.100.25 Port Orford-cedar -Douglas-fir /California Hazelnut [*Chamaeopsis lawsoniana*-*Pseudotsuga menziesii*/*Corylus cornuta* var. *californica*] (Jimerson et al. 1999)
- \*81.100.26 Port Orford-cedar -Douglas-fir – Red Alder/Vine Maple [*Chamaeopsis lawsoniana*-*Pseudotsuga menziesii*-*Alnus rubra*/*Berberis nervosa*] (Jimerson et al. 1999)
- \*81.100.27 Port Orford-cedar - Western White Pine / Western Azalea –Dwarf Tanbark oak – Labrador Tea [*Chamaeopsis lawsoniana*-*Pinus monticola*/*Rhododendron occidentale* – *Lithocarpus densiflorus* var. *echinoides*] (Jimerson et al. 1999)
- \*81.100.28 Port Orford-cedar - Western White Pine /Labrador Tea / California Pitcher Plant//coastal [*Chamaeopsis lawsoniana*-*Pinus monticola*/*Ledum glandulosum*/*Darlingtonia californica*] (Jimerson et al. 1999)
- \*81.100.29 Port Orford-cedar - Mixed Conifer /Huckleberry Oak-Western Azalea [*Chamaeopsis lawsoniana*-*Pseudotsuga menziesii* –(*Abies concolor*-*Pinus lambertiana*)/*Quercus vaccinifolia* –*Rhododendron occidentale*] (Jimerson et al. 1999)
- \*81.100.30 Port Orford-cedar - White Fir / Western Azalea-Huckleberry Oak [*Chamaeopsis lawsoniana* – *Abies concolor*/*Rhododendron occidentale* – *Quercus vaccinifolia*] (Jimerson et al. 1999)
- \*81.100.31 Port Orford-cedar - White Fir / Sierra Laurel-Bush Chinquapin [*Chamaeopsis lawsoniana* – *Abies concolor*/*Leucothoe davisiae*-*Chrysolepis sempervirens*] (Jimerson et al. 1999)
- \*81.100.32 Port Orford-cedar - White Fir / Bush Chinquapin-Western Azalea [*Chamaeopsis lawsoniana* – *Abies concolor*/ *Chrysolepis sempervirens*-*Rhododendron occidentale*] (Jimerson et al. 1999)
- \*81.100.33 Port Orford-cedar - Western White Pine / Labrador Tea/California Pitcher Plant //interior [*Chamaeopsis lawsoniana*-*Pinus monticola*/*Ledum glandulosum*/*Darlingtonia californica*//interior] (Jimerson et al. 1999)
- \*81.100.34 Port Orford-cedar - Western White Pine /Sitka Alder [*Chamaeopsis lawsoniana*-*Pinus monticola*/*Alnus sinuata*] (Jimerson et al. 1999)
- \*81.100.35 Port Orford-cedar - Western White Pine /Thinleaf Huckleberry [*Chamaeopsis lawsoniana*-*Pinus monticola*/*Vaccinium membranaceum*](Jimerson et al. 1999)
- \*81.100.36 Port Orford-cedar - Western White Pine //Wet Herb Complex [*Chamaeopsis lawsoniana*-*Pinus monticola*/*Veratrum californicum*-*Lilium* sp.] (Jimerson et al. 1999)
- \*81.100.37 Port Orford-cedar - Western White Pine //Dry Herb Complex [*Chamaeopsis lawsoniana*-*Pinus monticola*// *dry herb*] (Jimerson et al. 1999)
- \*81.100.38 Port Orford-cedar - Mountain Hemlock /Bush Chinquapin [*Chamaeopsis lawsoniana*-*Tsuga mertensiana*/*Chrysolepis sempervirens*](Jimerson et al. 1999)

- \*81.100.39 Port Orford-cedar - Mountain Hemlock /Labrador Tea [*Chamaeopsis lawsoniana-Tsuga mertensiana/Ledum glandulosum*] (Jimerson et al. 1999)
- \*81.100.40 Port Orford-cedar - Mountain Hemlock /Sierra Laurel [*Chamaeopsis lawsoniana-Tsuga mertensiana/Leucothoe davisiae*] (Jimerson et al 1999)
- \*81.200.00 Alaska Yellow-cedar Unique Stands [*Chamaecyparis nootkatensis*]
- \*81.300.00 McNab Cypress Woodland [*Cupressus macnabiana*]
- \*81.400.00 Pygmy Cypress Dwarf Woodland [*Cupressus goveniana* ssp. *goveniana*] {83161}
- \*81.400.01 Pygmy Cypress / Lichen [*Cupressus goveniana* ssp. *goveniana/Cladonia bellidiflora*] (Westman & Whittaker 1975)
- \*81.400.02 Pygmy Cypress / Lichen [*Cupressus goveniana* ssp. *goveniana/Cladina impexa*] (Westman & Whittaker 1975)
- \*81.400.03 Pygmy Cypress / *Ramalina tharusta* [*Cupressus goveniana* ssp. *goveniana*] (Westman & Whittaker 1975)
- \*81.400.04 Pygmy Cypress / *Usnea subfloridana* [*Cupressus goveniana* ssp. *goveniana*] (Westman & Whittaker 1975)
- \*81.500.00 Sargent Cypress Woodland [*Cupressus sargentii*]
- 81.600.00 Unique Stands of Cypress [*Cupressus* spp.]
  - \*81.600.10 Baker Cypress Stands [*Cupressus bakeri*]
  - \*81.600.20 Cuyamaca Cypress Stands [*Cupressus stephensonii*]
  - \*81.600.30 Gowen Cypress Stands [*Cupressus goveniana* ssp. *goveniana*] {83162}
  - \*81.600.40 Monterey Cypress Stands [*Cupressus macrocarpa*] {83150}
  - \*81.600.50 Piute Cypress Stands [*Cupressus nevadensis*] {83230}
  - \*81.600.60 Santa Cruz Cypress Stands [*Cupressus abramsiana*] {83220}
  - \*81.600.70 Tecate Cypress Stands [*Cupressus forbesii*]
- 82.000.00 Coastal and Montane Douglas-fir Forests and Woodlands [*Pseudotsuga* spp.]
  - 82.000.01 Mixed evergreen forest {82400}
  - \*82.100.00 Bigcone Douglas-fir Forest [*Pseudotsuga macrocarpa*] {84150}
  - 82.200.00 Douglas-fir Forest [*Pseudotsuga menziesii*]
    - \*82.200.01 Douglas-fir - Bigleaf Maple / Hazel [*Pseudotsuga menziesii-Acer macrophyllum/Corylus cornuta*] (Fites 1993)
    - \*82.200.02 Douglas-fir - Bigleaf Maple / Trail Plant [*Pseudotsuga menziesii-Acer macrophyllum/Adenocaulon bicolor*] (Fites 1993)
    - \*82.200.03 Douglas-fir - Pacific Dogwood / Hazel [*Pseudotsuga menziesii-Cornus nuttallii/Corylus cornuta*] (Fites 1993)
    - \*82.200.04 Douglas-fir / Hazel / Trail Plant [*Pseudotsuga menziesii/Corylus cornuta/Adenocaulon bicolor*] (Fites 1993)
    - \*82.200.05 Douglas-fir - California Bay / Poison-oak [*Pseudotsuga menziesii-Umbellularia californica/Toxicodendron diversilobum*] (Jimerson 1993)
    - \*82.200.06 Moved to Douglas-fir - Canyon live oak Alliance
    - \*82.200.07 Moved to Douglas-fir - Canyon Live Oak Alliance
    - \*82.200.08 Moved to Douglas-fir - Canyon Live Oak Alliance

- \*82.200.09 Douglas-fir - Chinquapin / Bear-grass [*Pseudotsuga menziesii-Chrysolepis chrysophylla/Xerophyllum tenax*] (Jimerson 1993)
- \*82.200.10 Douglas-fir - Chinquapin / Rhododendron - Little Oregon- grape [*Pseudotsuga menziesii-Chrysolepis chrysophylla/Rhododendron spp.-Berberis nervosa*] (Jimerson 1993)
- \*82.200.11 Douglas-fir - Chinquapin / Rhododendron - Sadler Oak /Bear-grass [*Pseudotsuga menziesii-Chrysolepis chrysophylla/Rhododendron spp.-Quercus sadleriana/Xerophyllum tenax*] (Jimerson 1993)
- \*82.200.12 Douglas-fir - Chinquapin - Tanoak [*Pseudotsuga menziesii-Chrysolepis chrysophylla-Lithocarpus densiflora*] (Jimerson 1993)
- \*82.200.13 Douglas-fir - Chinquapin - Tanoak / Little Oregon-grape [*Pseudotsuga menziesii-Chrysolepis chrysophyllum-Lithocarpus densiflora/Berberis nervosa*] (Jimerson 1993)
- \*82.200.14 Douglas-fir / Hazel [*Pseudotsuga menziesii/Corylus cornuta*] (Jimerson 1993)
- \*82.200.15 Douglas-fir / Huckleberry Oak [*Pseudotsuga mezieisii/Quercus vaccinifolia*] (Jimerson 1993, Sawyer *et al.* 1978a)
- \*82.200.16 Douglas-fir / Huckleberry Oak - Bush Tanoak [*Pseudotsuga menziesii/Quercus vaccinifolia-Lithocarpus densiflora var.echinoides*] (Jimerson 1993)
- \*82.200.17 Douglas-fir - Incense-Cedar / California Fescue [*Pseudotsuga menziesii-Calocedrus decurrens/Festuca californica*] (Jimerson 1993)
- \*82.200.18 Douglas-fir / Yerba de Selva [*Pseudotsuga menziesii/Whipplea modesta*] (Jimerson 1993)
- \*82.200.19 Douglas-fir - Oregon White Oak / Grass [*Pseudotsuga menziesii-Quercus garryana var. garryana/Grass*] (Jimerson 1993)
- \*82.200.20 Douglas-fir / Vine Maple - Little Oregon-grape [*Pseudotsuga menziesii/Acer circinatum-Berberis nervosa*] (Jimerson 1993)
- 82.200.21 Douglas-fir - Bigleaf Maple / Sword Fern [*Pseudotsuga menziesii-Acer macrophyllum/Polystichum munitum*] (Jimerson 1993)
- \*82.200.22 moved to Port Orford-Cedar Alliance
- \*82.200.23 moved to Port Orford-Cedar alliance
- \*82.200.24 moved to Port Orford-Cedar alliance
- \*82.200.25 Moved to Red Fir Alliance
- \*82.200.26 Moved to White Fir Alliance
- \*82.200.27 moved to White Fir Alliance
- \*82.200.28 White Fir - Douglas-fir - Bigleaf Maple [*Abies concolor-Pseudotsuga menziesii-Acer macrophyllum*] (Jimerson 1993)
- \*82.200.29 White Fir - Douglas-fir - Black Oak [*Abies concolor-Pseudotsuga menziesii-Quercus kelloggii*] (Jimerson 1993)
- \*82.200.30 White Fir - Douglas-fir - Canyon Live Oak / White-veined Shinleaf [*Abies concolor-Pseudotsuga menziesii-Quercus chrysolepis/Pyrola picta*] (Jimerson 1993)
- \*82.200.31 White Fir - Douglas-fir - Canyon Live Oak [*Abies concolor-Pseudotsuga menziesii-Quercus chrysolepis*] (Jimerson 1993)
- \*82.200.32 White Fir - Douglas-fir - Canyon Live Oak / White-flower Hawkweed-Grass [*Abies concolor-Pseudotsuga menziesii-Quercus chrysolepis/Hieracium albiflorum-Grass*] (Jimerson 1993)
- \*82.200.33 White Fir - Douglas-fir - Canyon Live Oak / Little Oregon-grape [*Abies concolor-Pseudotsuga menziesii-Quercus chrysolepis/Berberis nervosa*] (Jimerson 1993)
- \*82.200.34 White Fir - Douglas-fir - Chinquapin / Little Oregon-grape / Vanilla Leaf [*Abies concolor-Pseudotsuga menziesii-Chrysolepis chrysophylla/Berberis nervosa/Achlys triphylla*] (Jimerson 1993)
- 82.200.35 Moved to White Fir alliance

- 82.200.36 White Fir - Douglas-fir / Sadler Oak - Huckleberry Oak [*Abies concolor-Pseudotsuga menziesii/Quercus sadleriana-Quercus vaccinifolia*] (Jimerson 1993)
- 82.200.37 White Fir - Douglas-fir / Sadler Oak - Pinemat Manzanita [*Abies concolor-Pseudotsuga menziesii/Quercus sadleriana-Arctostaphylos nevadensis*] (Jimerson 1993)
- \*82.200.38 White Fir - Douglas-fir / Grass [*Abies concolor-Pseudotsuga menziesii/Grass*] (Jimerson 1993)
- \*82.200.39 White Fir - Douglas-fir / Hazel [*Abies concolor-Pseudotsuga menziesii/Corylus cornuta*] (Jimerson 1993)
- 82.200.40 White Fir - Douglas-fir / Huckleberry Oak [*Abies concolor-Pseudotsuga menziesii/Quercus vaccinifolia*] (Jimerson 1993)
- \*82.200.41 White Fir - Douglas-fir / Yerba de Selva [*Abies concolor-Pseudotsuga menziesii/Whipplea modesta*] (Jimerson 1993)
- \*82.200.42 White Fir - Douglas-fir / Rhododendron - Sadler Oak [*Abies concolor-Pseudotsuga menziesii/Rhododendron spp.-Quercus sadleriana*] (Jimerson 1993)
- \*82.200.43 White Fir - Douglas-fir - Tanoak / Little Oregon-grape [*Abies concolor-Pseudotsuga menziesii-Lithocarpus densiflora/Berberis nervosa*] (Jimerson 1993)
- \*82.200.44 White Fir - Douglas-fir / Thimbleberry [*Abies concolor-Pseudotsuga menziesii/Rubus parviflorus*] (Jimerson 1993)
- \*82.200.45 White Fir - Douglas-fir / Vine Maple [*Abies concolor-Pseudotsuga menziesii/Acer circinatum*] (Jimerson 1993)
- \*82.200.46 White Fir - Douglas-fir / Wild Rose / Twinflower [*Abies concolor-Pseudotsuga menziesii/Rosa gymnocarpa/Linnaea borealis*] (Jimerson 1993)
- \*82.200.47 Moved to White Fir alliance
- \*82.200.48 moved to Jeffrey Pine-fir alliance
- \*82.200.49 Douglas-fir / Vanilla Leaf [*Pseudotsuga menziesii/Achlys triphylla*] (Keeler-Wolf 1985a, 1987a, 1989b)
- \*82.200.50 Douglas-fir / Madrone [*Pseudotsuga menziesii/Arbutus menziesii*] (Laidlaw-Holmes 1981)
- \*82.200.51 Douglas-fir / Rattlesnake Plantain [*Pseudotsuga menziesii/Goodyera oblongifolia*] (Sawyer 1981a)
- 82.200.52 Douglas-fir / Huckleberry Oak [*Pseudotsuga menziesii/Quercus vaccinifolia*] (Sawyer *et al.* 1978)
- 82.200.53 Douglas-fir / Greenleaf Manzanita [*Pseudotsuga menziesii/Arctostaphylos patula*] (Sawyer & Stillman 1977)
- \*82.200.54 Douglas-fir / Prince's-pine [*Pseudotsuga menziesii/Chimaphilia umbellata*] (Sawyer & Stillman 1977)
- \*82.200.55 Douglas-fir / Twinflower [*Pseudotsuga menziesii/Linnaea borealis*] (Sawyer & Stillman 1977)
- \*82.200.56 Douglas-fir / Hazel [*Pseudotsuga menziesii/Corylus cornuta*] (Simpson 1980)
- \*82.200.57 Douglas-fir / Inside-out Flower [*Pseudotsuga menziesii/Vancouveria planipetala*] (Simpson 1980)
- \*82.200.58 Douglas-fir / Rhododendron [*Pseudotsuga menziesii/Rhododendron spp.*] (Simpson 1980)
- \*82.200.59 Douglas-fir / Salal [*Pseudotsuga menziesii/Gaultheria shallon*] (Simpson 1980)
- \*82.200.60 Black Oak - Douglas-fir [*Quercus kelloggii-Pseudotsuga menziesii*] (Stuart *et al.* 1992)
- \*82.200.61 Douglas-fir [*Pseudotsuga menziesii*] (Stuart *et al.* 1992)
- \*82.200.62 Douglas-fir - Jeffrey Pine - Incense-cedar [*Pseudotsuga menziesii-Pinus jeffreyi-Calocedrus decurrens*] (Stuart *et al.* 1992)

- 82.200.63 Douglas-fir - White Alder / Himalaya Berry [*Pseudotsuga menziesii*-*Abies concolor*/*Rubus discolor*] (Stuart *et al.* 1992)
- \*82.200.64 Douglas-fir / Little Oregon-grape [*Pseudotsuga menziesii*/*Berberis nervosa*] (Taylor 1975a, b)
- \*82.200.65 Douglas-fir / Pacific Dogwood [*Pseudotsuga menziesii*/*Cornus nuttallii*] (Taylor & Teare 1979a)
- \*82.200.66 Douglas-fir - California Bay [*Pseudotsuga menziesii*-*Umbellularia californica*] (Wainwright & Barbour 1984)
- \*82.200.67 Coastal Douglas-fir-Western Hemlock Forest [*Pseudotsuga menziesii*-*Tsuga heterophylla*] {82410}
- 82.200.68 Upland Douglas-fir forest [*Pseudotsuga menziesii*] {82420}
- 82.200.69 Douglas-fir - California Bay / Sword Fern [*Pseudotsuga menziesii*-*Umbellularia californica*/*Polystichum munitum*] (Keeler-Wolf, *et al.* 2001)
- 82.200.70 Douglas-fir - California Bay / California Coffeeberry [*Pseudotsuga menziesii*-*Umbellularia californica*/*Rhamnus californicus*] (Keeler-Wolf, *et al.* 2001)
- 82.200.71 Douglas-fir / Coast Live Oak [*Pseudotsuga menziesii*/*Quercus agrifolia*] (Keeler-Wolf, *et al.* 2001)
- 82.200.72 Douglas-fir / Coyote Brush [*Pseudotsuga menziesii*/*Baccharis pilularis*] (Keeler-Wolf, *et al.* 2001)
- 82.200.73 Douglas-fir - White Fir - Incense-cedar [*Pseudotsuga menziesii*-*Abies concolor*-*Calocedrus decurrens*] (Keeler-Wolf and Moore 2001)
- \*82.200.74 *Pseudotsuga menziesii*/*Quercus vaccinifolia* - *Rhododendron macrophyllum* association (Jimerson 1993)
- \*82.200.75 *Pseudotsuga menziesii*/*Rhododendron macrophyllum* association, (Simson 1980)
- \*82.300.00 Douglas-fir - Canyon Live Oak Forest [*Pseudotsuga menziesii*-*Quercus chrysolepis*]
- \*82.300.01 Douglas-fir - Canyon Live Oak / Sword Fern [Mixed Conifer-*Quercus chrysolepis*/*Polystichum munitum*] (Fites 1993)
- \*82.300.02 Douglas-fir - Canyon Live Oak - Madrone / Poison-oak [*Pseudotsuga menziesii*-*Quercus chrysolepis*-*Arbutus menziesii*/*Toxicodendron diversilobum*] (Jimerson 1993)
- \*82.300.03 Douglas-fir - Canyon Live Oak [*Pseudotsuga menziesii*-*Quercus chrysolepis*] (Taylor & Teare 1979a)
- \*82.300.04 Douglas-fir - Canyon Live Oak / Rockpile [*Pseudotsuga menziesii*-*Quercus chrysolepis*/Rockpile] (Jimerson 1993)
- \*82.300.05 Douglas-fir - Canyon Live Oak - Tanoak [*Pseudotsuga menziesii*-*Quercus chrysolepis*-*Lithocarpus densiflora*] (Jimerson 1993)
- \*82.400.00 Douglas-fir - Ponderosa Pine Forest [*Pseudotsuga menziesii*-*Pinus ponderosa*]
- \*82.400.01 Black Oak - Douglas-fir - Bigleaf Maple [*Quercus kelloggii*-*Pseudotsuga menziesii*-*Acer macrophyllum*] (Jimerson 1993)
- \*82.400.02 Douglas-fir - Ponderosa Pine - Incense-cedar [*Pseudotsuga menziesii*-*Pinus ponderosa*-*Calocedrus decurrens*] (Stuart *et al.* 1992)
- \*82.400.03 Douglas-fir - Ponderosa Pine - Jeffrey Pine / One-sided Bluegrass [*Pseudotsuga menziesii*-*Pinus ponderosa*-*Pinus jeffreyi*/*Poa secunda*] (Smith 1994)
- \*82.400.04 Douglas-fir - Ponderosa Pine [*Pseudotsuga menziesii*-*Pinus ponderosa*] (Taylor & Teare 1979b)
- 82.400.05 Douglas-fir -Ponderosa pine -Incense-cedar [*Pseudotsuga menziesii*-*Pinus ponderosa*-*Calocedrus decurrens*] (Keeler-Wolf & Moore 2001)
- 82.500.00 Douglas-fir - Tanoak Forest [*Pseudotsuga menziesii*-*Lithocarpus densiflora*]

- \*82.500.01 Douglas-fir - Tanoak / Prince's Pine [*Pseudotsuga menziesii-Lithocarpus densiflora/Chimaphila umbellata*] (Keeler-Wolf 1985a, 1987b, 1989b)
- \*82.500.02 Douglas-fir - Tanoak - Bigleaf Maple / Sword Fern [*Pseudotsuga menziesii-Lithocarpus densiflora-Acer macrophyllum/Polystichum munitum*] (Jimerson 1993)
- \*82.500.03 Douglas-fir - Tanoak - Black Oak / Wild Rose [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus kelloggii/Rosa gymnocarpa*] (Jimerson 1993)
- 82.500.04 Douglas-fir - Tanoak - California Bay / Poison-oak [*Pseudotsuga menziesii-Lithocarpus densiflora-umbellularia californica/Toxicodendron diversilobum*] (Jimerson 1993)
- 82.500.05 Douglas-fir - Tanoak - Canyon Live Oak - Black Oak /Poison-oak [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus chrysolepis-Quercus kelloggii/Toxicodendron diversilobum*] (Jimerson 1993)
- 82.500.06 Douglas-fir - Tanoak - Canyon Live Oak / Little Oregon-grape - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus chrysolepis-Berberis nervosa-Gaultheria shallon*] (Jimerson 1993)
- \*82.500.07 Douglas-fir - Tanoak - Canyon Live Oak / Little Oregon-grape [*Pseudotsuga menziesii-Lithocarpus densiflora/Berberis nervosa*] (Jimerson 1993)
- \*82.500.08 Douglas-fir - Tanoak - Canyon Live Oak / Black Huckleberry [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus chrysolepis/Vaccinium ovatum*] (Jimerson 1993)
- \*82.500.09 Douglas-fir - Tanoak - Canyon Live Oak / Black Huckleberry - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus chrysolepis/Vaccinium ovatum-Gaultheria shallon*] (Jimerson 1993)
- 82.500.10 Douglas-fir - Tanoak - Canyon Live Oak / Poison-oak [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus chrysolepis/Toxicodendron diversilobum*] (Jimerson 1993)
- 82.500.11 Douglas-fir - Tanoak - Canyon Live Oak / Rockpile [*Pseudotsuga menziesii-Lithocarpus densiflora-Quercus chrysolepis/Rockpile*] (Jimerson 1993)
- 82.500.12 Douglas-fir - Tanoak - Chinquapin / Bracken [*Pseudotsuga menziesii-Lithocarpus densiflora-Chrysolepis chrysophylla/Pteridium aquilinum*] (Jimerson 1993)
- \*82.500.13 Douglas-fir - Tanoak - Chinquapin / Little Oregon-grape [*Pseudotsuga menziesii-Lithocarpus densiflora-Chrysolepis chrysophylla/Berberis nervosa*] (Jimerson 1993)
- \*82.500.14 Douglas-fir - Tanoak - Chinquapin / Rhododendron / Beargrass [*Pseudotsuga menziesii-Lithocarpus densiflora-Chrysolepis chrysophylla/Rhododendron spp./Xerophyllum tenax*] (Jimerson 1993)
- \*82.500.15 Douglas-fir - Tanoak - Chinquapin / Rhododendron - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora-Chrysolepis chrysophylla/Rhododendron spp.-Gaultheria shallon*] (Jimerson 1993)
- \*82.500.16 Douglas fir - Tanoak - Chinquapin / Salal [*Pseudotsuga menziesii-Lithocarpus densiflora-Chrysolepis chrysophylla/Gaultheria shallon*] (Jimerson 1993)
- \*82.500.17 Douglas-fir - Tanoak / Little Oregon-grape [*Pseudotsuga menziesii-Lithocarpus densiflora/Berberis nervosa*] (Thornburgh 1987, Jimerson 1993)
- \*82.500.18 Douglas-fir - Tanoak / Little Oregon-grape - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora/Berberis nervosa-Gaultheria shallon*] (Jimerson 1993)
- \*82.500.19 Douglas-fir - Tanoak / Black Huckleberry [*Pseudotsuga menziesii-Lithocarpus densiflora/Vaccinium ovatum*] (Jimerson 1993)

- \*82.500.20 Douglas-fir - Tanoak / Black Huckleberry - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora/Vaccinium ovatum-Gaultheria shallon*] (Jimerson 1993)
- \*82.500.21 Douglas-fir - Tanoak / Hazel [*Pseudotsuga menziesii-Lithocarpus densiflora/Corylus cornuta*] (Jimerson 1993)
- \*82.500.22 Douglas-fir - Tanoak - Incense-cedar / California Fescue [*Pseudotsuga menziesii-Lithocarpus densiflora-Calocedrus decurrens/Festuca californica*] (Jimerson 1993)
- \*82.500.23 Douglas-fir - Tanoak / Poison-oak - Hairy Honeysuckle [*Pseudotsuga menziesii-Lithocarpus densiflora/Toxicodendron diversilobum-Lonicera hispidula*] (Jimerson 1993)
- \*82.500.24 Douglas-fir - Tanoak - Port Orford-cedar - California Bay /Black Huckleberry [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana-Umbellularia californica/Vaccinium ovatum*] (Jimerson 1993)
- \*82.500.25 Douglas-fir - Tanoak - Port Orford-cedar / Little Oregon-grape / Twinflower [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana/Berberis nervosa/Linnaea borealis*] (Jimerson 1993)
- \*82.500.26 Douglas-fir - Tanoak - Port Orford-cedar / Black Huckleberry [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana/Vaccinium ovatum*] (Jimerson 1993)
- \*82.500.27 Douglas-fir - Tanoak - Port Orford-cedar / Black Huckleberry - Western Azalea [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana/Vaccinium ovatum-Rhododendron occidentale*] (Jimerson 1993)
- \*82.500.28 Douglas-fir - Tanoak - Port Orford-cedar / Red Huckleberry [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana/Vaccinium parvifolium*] (Jimerson 1993)
- \*82.500.29 Douglas-fir - Tanoak - Port Orford-cedar / Salal [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana/Gaultheria shallon*] (Jimerson 1993)
- \*82.500.30 Douglas-fir - Tanoak - Port Orford-cedar / Vine Maple [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana/Acer circinatum*] (Jimerson 1993)
- \*82.500.31 Douglas-fir - Tanoak - Port Orford-cedar - White Alder /Riparian [*Pseudotsuga menziesii-Lithocarpus densiflora-Chamaecyparis lawsoniana-Alnus rhombifolia/Riparian*] (Jimerson 1993)
- \*82.500.32 Douglas-fir - Tanoak / Rhododendron - Black Huckleberry [*Pseudotsuga menziesii-Lithocarpus densiflora/Rhododendron spp.-Vaccinium ovatum*] (Jimerson 1993)
- \*82.500.33 Douglas-fir - Tanoak / Rhododendron - Huckleberry Oak [*Pseudotsuga menziesii-Lithocarpus densiflora/Rhododendron spp.-Quercus vaccinifolia*] (Jimerson 1993)
- \*82.500.34 Douglas-fir - Tanoak / Rhododendron - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora/Rhododendron spp.-Gaultheria shallon*] (Jimerson 1993)
- \*82.500.35 Douglas-fir - Tanoak / Salal [*Pseudotsuga menziesii-Lithocarpus densiflora/Gaultheria shallon*] (Jimerson 1993)
- \*82.500.36 Douglas-fir - Tanoak / Vine Maple [*Pseudotsuga menziesii-Lithocarpus densiflora/Acer circinatum*] (Jimerson 1993)
- \*82.500.37 Douglas-fir - Tanoak / Vine Maple - Salal [*Pseudotsuga menziesii-Lithocarpus densiflora/Acer circinatum-Gaultheria shallon*] (Jimerson 1993)
- \*82.500.38 Douglas-fir - Tanoak / Pacific Yew [*Pseudotsuga menziesii-Lithocarpus densiflora/Taxus brevifolia*] (Mize 1973)

- \*82.500.39 Douglas-fir - Tanoak - Sugar Pine [*Pseudotsuga menziesii*-*Lithocarpus densiflora*-*Pinus lambertiana*] (1973)
- \*82.500.40 Douglas-fir - Tanoak / Vanilla Leaf [*Pseudotsuga menziesii*-*Lithocarpus densiflora*/*Achlys triphylla*] (Mize 1973)
- \*82.500.41 Douglas-fir - Tanoak / Black Huckleberry [*Pseudotsuga menziesii*-*Lithocarpus densiflora*/*Vaccinium ovatum*] (Simpson 1980)
- \*82.500.42 Douglas-fir - Tanoak / Poison-oak [*Pseudotsuga menziesii*-*Lithocarpus densiflora*/*Toxicodendron diversilobum*] (Thornburgh 1987)
- \*82.500.43 Douglas-fir – Tanoak/Mountain Dogwood [*Pseudotsuga menziesii* – Mixed conifer -*Lithocarpus densiflora*/*Cornus nuttallii*] (Fites 1993)
- \*82.500.44 Douglas-fir – Tanoak/Iris [*Pseudotsuga menziesii* –Mixed conifer - *Lithocarpus densiflora*/*Iris* spp.] (Fites 1993)
- \*82.500.45 Douglas-fir – Tanoak/ Hazel [*Pseudotsuga menziesii* –Mixed Conifer – *Lithocarpus densiflora*/*Corulus cornuta*] (Fites 1993)
  
- 82.500.46 *Pseudotsuga menziesii* - *Lithocarpus densiflorus*/*Quercus vaccinifolia*-*Holodiscus discolor* association (Jimerson 1993)
  
- \*82.600.00 Douglas-fir – Incense-cedar Forest [*Pseudotsuga menziesii* – *Calocedrus decurrens*]
- \*82.600.01 Douglas-fir – Incense-cedar – California Bay/Poison Oak [*Pseudotsuga menziesii*- *Calocedrus decurrens* - *Umbellularia californica*/*Toxicodendron diversiloba* association] (Jimerson 1993)
- \*82.600.02 Douglas-fir – Incense-cedar /California Fescue [*Pseudotsuga menziesii* - *Calocedrus decurrens*/*Festuca californica*] (Jimerson 1993)
- \*82.600.03 Moved to 87.020.29.
- \*82.600.04 *Pseudotsuga menziesii* - *Calocedrus decurrens*/*Quercus vaccinifolia* association (Jimerson 1993)
- \*82.600.05 Duplicated 82.200.16 so removed.
- \*82.600.06 Moved to 82.200.74.
- \*82.600.07 Duplicated 82.200.15 so removed, but added reference name there.
- \*82.600.08 Duplicated 82.200.51 so removed.
- \*82.600.09 Moved to 82.200.75.
- \*82.600.10 Duplicated 82.200.59 so removed.
- \*82.600.11 *Calocedrus decurrens* - *Pseudotsuga menziesii* association (Stuart *et al.* 1992):

83.000.00 Coastal and Montane Spruce Forests [*Picea* spp.]

- \*83.100.00 Engelmann Spruce Forest [*Picea engelmannii*]
  
- \*83.200.00 Sitka Spruce Forest [*Picea sitchensis*]
- \*83.200.01 Sitka Spruce / False Lily-of-the valley [*Picea sitchensis*-*Maianthemum dilatatum*] (Imper & Sawyer 1987)
- \*83.200.02 Sitka Spruce / Salmonberry [*Picea sitchensis*/*Rubus spectabilis*] (Imper & Sawyer 1987)
- \*83.200.03 Sitka Spruce / Sword Fern [*Picea sitchensis*/*Polystichum munitum*] (Imper & Sawyer 1987)

- \*83.200.04 Sitka Spruce - Western Hemlock [*Picea sitchensis*/*Tsuga heterophylla*]  
(Westman & Whittaker 1975)
- \*83.200.05 Sitka Spruce Forest {82110}
- \*83.300.00 Brewer Spruce Forest [*Picea breweriana*]
- 84.000.00 Coastal and Montane Hemlock Forests [*Tsuga* spp.]
  - 84.100.00 Mountain Hemlock Forest [*Tsuga mertensiana*]
    - 84.100.01 Mountain Hemlock / Cascade Heather [*Tsuga mertensiana*/*Phyllodoce  
empetriformis*] (Imper 1988a)
    - 84.100.02 Mountain Hemlock / Parry Rush [*Tsuga mertensiana*/*Juncus parryi*]  
(Imper 1988a)
    - 84.100.03 Mountain Hemlock / Sadler Oak [*Tsuga mertensiana*/*Quercus  
sadleriana*] (Jimerson 1993)
    - 84.100.04 Mountain Hemlock [*Tsuga mertensiana*] (Potter 1994)
    - 84.100.05 entry moved to 84.100.10
    - 84.100.06 Mountain Hemlock / Dwarf Bilberry [*Tsuga mertensiana*/*Vaccinium  
caespitosum*] (Sawyer & Thornburgh 1977)
    - 84.100.07 Mountain Hemlock / Huckleberry Oak [*Tsuga mertensiana*/*Quercus  
vaccinifolia*] (Sawyer & Thornburgh 1977)
    - 84.100.08 Mountain Hemlock / White-veined Shinleaf [*Tsuga mertensiana*/*Pyrola  
picta*] (Sawyer & Thornburgh 1977)
    - 84.100.09 Mountain Hemlock / Heartleaf Arnica [*Tsuga mertensiana*/*Arnica  
cordifolia*] (Taylor 1984)
    - 84.100.10 Mountain Hemlock-Western White Pine / Broad-seeded Rock Cress  
[*Tsuga mertensiana*- *Pinus monticola*/*Arabis platysperma*] (*Sensu.* Potter  
1994 *Tsuga mertensiana* /Steep) (Keeler-Wolf and Moore 2001)
    - 84.100.11 Mountain Hemlock - Lodgepole Pine -Western White Pine [*Tsuga  
mertensiana*-*Pinus contorta* var. *murrayana*-*Pinus monticola*] (Parker  
1988)
    - 84.100.12 Mountain Hemlock - Lodgepole Pine / Mountain Heather [*Tsuga  
mertensiana*-*Pinus contorta* var. *murrayana*/*Phyllodoce brewerii*]  
(Keeler-Wolf and Moore 2001)
    - 84.100.13 Mountain Hemlock - Lodgepole Pine / Ross Sedge [*Tsuga mertensiana*-  
*Pinus contorta* var. *murrayana*/*Carex rossii*] (Keeler-Wolf and Moore  
2001)
  - \*84.200.00 Western Hemlock Forest [*Tsuga heterophylla*] {82200}
- 85.000.00 Incense-cedar Forests [*Calocedrus* spp.]
  - \*85.100.00 Incense-cedar Forest [*Calocedrus decurrens*]
    - \*85.100.01 Incense-cedar / Twayblane [*Calocedrus decurrens*/*Listera  
convallarioides*] (Muldavin 1982)
    - \*85.100.02 Incense-cedar - Douglas-fir [*Calocedrus decurrens*-*Pseudotsuga  
menziesii*] (Stuart *et al.* 1992)
    - 85.100.03 Incense-cedar - White Alder [*Calocedrus decurrens*-*Alnus rhombifolia*]  
(Keeler-Wolf and Moore 2001)
- 86.000.00 Coastal and Montane Redwood Forests [*Sequoia sempervirens*] {82300}
  - \*86.100.00 Redwood Forest [*Sequoia sempervirens*]
    - \*86.100.01 Redwood - Bigleaf Maple / California Polypody / Gamboa [*Sequoia  
sempervirens*-*Acer macrophylla*/*Polypodium californicum*/*Gamboa*]  
(Borchert *et al.* 1988)

- \*86.100.02 Redwood / Bracken - Chain Fern / Streamsides [*Sequoia sempervirens/Pteridium aquilinum-Woodwardia fimbriata/Streamsides*] (Borchert *et al.* 1988)
- \*86.100.03 Redwood / Bracken - Trillium / Gamboa - Sur [*Sequoia sempervirens/Pteridium aquilinum-Trillium ovatum/Gamboa-Sur*] (Borchert *et al.* 1988)
- \*86.100.04 Redwood / Gamboa - Sur [*Sequoia sempervirens/Gamboa-Sur*] (Borchert *et al.* 1988)
- \*86.100.05 Redwood / Man Root - Common Vetch / Gamboa - Sur [*Sequoia sempervirens/Marah fabaceus-Vicia angustifolia/Gamboa-Sur*] (Borchert *et al.* 1988)
- \*86.100.06 Redwood - Tanoak / Round-fruited Sedge - Douglas Iris /Gamboa [*Sequoia sempervirens-Lithocarpus densiflora/Carex globosa-Iris douglasiana*] (Borchert *et al.* 1988)
- \*86.100.07 Redwood / Deer Fern [*Sequoia sempervirens/Blechnum spicant*] (Lenihan 1990)
- \*86.100.08 Redwood / Little Oregon-grape [*Sequoia sempervirens/Berberis nervosa*] (Lenihan 1990)
- \*86.100.09 Redwood / Madrone [*Sequoia sempervirens/Arbutus menziesii*] (Lenihan 1990)
- \*86.100.10 Redwood - Douglas-fir / Madrone [*Sequoia sempervirens-Pseudotsuga menziesii/Arbutus menziesii*] (Matthews 1986a, 1986b)
- \*86.100.11 Redwood - Douglas-fir / Salal [*Sequoia sempervirens-Pseudotsuga menziesii/Gaultheria shallon*] (Matthews 1986a, 1986b)
- \*86.100.12 Redwood - Douglas-fir / Black Huckleberry [*Sequoia sempervirens-Pseudotsuga menziesii/Vaccinium ovatum*] (Matthews 1986a, 1986b)
- \*86.100.13 Redwood / Redwood Oxalis [*Sequoia sempervirens/Oxalis oregana*] (Matthews 1986a, 1986b)
- \*86.100.14 North Coast Alluvial Redwood Forest {61120}
- 86.100.15 Upland Redwood Forest {82320}
- 86.100.16 Redwood - Tanoak / Black Huckleberry [*Sequoia sempervirens-Lithocarpus densiflora/Vaccinium ovatum*] (Keeler-Wolf, *et al.* 2001)
- 86.100.17 Redwood - Douglas-fir / California Bay [*Sequoia sempervirens-Pseudotsuga menziesii/Umbellularia californica*] (Keeler-Wolf, *et al.* 2001)
  
- \*86.200.00 Giant Sequoia Forest [*Sequoiadendron giganteum*] {84250}
- 86.200.01 Giant Sequoia - Sugar Pine / Pacific Dogwood [*Sequoiadendron giganteum-Pinus lambertiana/Cornus nuttallii*] (Keeler-Wolf and Moore 2001)
  
- 87.000.00 Pine Forests and Woodlands [*Pinus spp.*]
  
- 87.010.00 Ponderosa Pine Forest and Woodland [*Pinus ponderosa*]
- \*87.010.01 Ponderosa Pine / Antelope Bitterbrush / Bolander Bedstraw [*Pinus ponderosa/Purshia tridentata var. tridentata*] (Fites 1993)
- \*87.010.02 Ponderosa Pine / Mountain Misery [*Pinus ponderosa/Chamaebatia foliolosa*] (Taylor & Randall 1977, Fites 1993)
- \*87.010.03 Ponderosa Pine / Greenleaf Manzanita - Mountain Misery [*Pinus ponderosa/Arctostaphylos patula-Chamaebatia foliolosa*] (Fites 1993)
- \*87.010.04 Ponderosa Pine / Big Sagebrush [*Pinus ponderosa/Artemisia tridentata*] (Keeler-Wolf 1984c)
- \*87.010.05 Ponderosa Pine / Antelope Bitterbrush [*Pinus ponderosa/Purshia tridentata var. tridentata*] (Keeler-Wolf 1984c, Vora 1988)
- \*87.010.06 Ponderosa Pine / California Brome [*Pinus ponderosa/Bromus carinatus*] (Keeler-Wolf 1984c)

- \*87.010.07 Ponderosa Pine / Shrubby Bedstraw [*Pinus ponderosa*/*Galium angustifolium*] (Keeler-Wolf 1986e, 1988e)
- \*87.010.08 Ponderosa Pine/ Mahala Carpet [*Pinus ponderosa*/*Ceanothus prostratus*] (Sawyer & Thornburgh 1977)
- \*87.010.09 Ponderosa Pine / Wedgeleaf Ceanothus [*Pinus ponderosa*/*Ceanothus cuneatus*] (Simpson 1980)
- \*87.010.10 Ponderosa Pine / Antelope Bitterbrush / Arrowleaf Balsam Root [*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*/*Balsamorhiza sagittata*] (Smith 1994)
- \*87.010.11 Ponderosa Pine / Antelope Bitterbrush - Choke Cherry /Orcutt Brome [*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*] (Smith 1994)
- \*87.010.12 Ponderosa Pine / Antelope Bitterbrush / Columbia Needlegrass / Pumice [*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*/*Stipa nelsonii*/Pumice] (Smith 1994)
- \*87.010.13 Ponderosa Pine / Antelope Bitterbrush - Greenleaf Manzanita / Columbia Needlegrass [*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*-*Arctostaphylos patula*/*Stipa nelsonii*] (Smith 1994)
- \*87.010.14 Ponderosa Pine / Antelope Bitterbrush - Tobacco Brush [*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*-*Ceanothus velutinus*] (Smith 1994)
- \*87.010.15 Ponderosa Pine / Antelope Bitterbrush / Tower Butterweed/ Granite [*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*/*Senecio integerrimus*/Granite] (Smith 1994)
- \*87.010.16 Ponderosa Pine / Antelope Bitterbrush - Wax Currant /Orcutt Brome [*Pinus ponderosa*/*Purshia tridentata* var.*tridentata*-*Ribes cereum*/*Bromus orcuttii*] (Smith 1994)
- \*87.010.17 Ponderosa Pine - Black Oak / Curlleaf Mountain-mahogany [*Pinus ponderosa*/*quercus kelloggii*/*Cercocarpus ledifolius*] (Smith 1994)
- \*87.010.18 Ponderosa Pine / Columbia Needlegrass [*Pinus ponderosa*/*Stipa nelsonii*] (Smith 1994)
- \*87.010.19 Ponderosa Pine / Curlleaf Mountain-mahogany - Antelope Bitterbrush / Idaho Fescue [*Pinus ponderosa*/*Cercocarpus ledifolius*-*Purshia tridentata* var. *tridentata*/*Festuca idahoensis*] (Smith 1994)
- \*87.010.20 Ponderosa Pine / Curlleaf Mountain-mahogany / Blue Wheatgrass [*Pinus ponderosa*/*Cercocarpus ledifolius*/*Pseudoroegneria spicata*] (Smith 1994)
- \*87.010.21 Ponderosa Pine - Douglas-fir / Antelope Bitterbrush /Mule's Ears [*Pinus ponderosa*-*Pseudotsuga menziesii*/*Purshia tridentata* var. *tridentata*/*Wyethia mollis*] (Smith 1994)
- \*87.010.22 Ponderosa Pine - Interior Live Oak [*Pinus ponderosa*-*Quercus wislizeni*] (Smith 1994)
- \*87.010.23 Ponderosa Pine - Lodgepole Pine / Service Berry [*Pinus ponderosa*-*Pinus contorta* ssp. *murrayana*/*Amelanchier alnifolia*] (Smith 1994)
- \*87.010.24 Ponderosa Pine / Mountain Big Sagebrush / Idaho Fescue [*Pinus ponderosa*/*Artemisia tridentata* var. *vaseyana*/*Festuca idahoensis*] (Smith 1994)
- \*87.010.25 Ponderosa Pine / Mountain Big Sagebrush - Antelope Bitterbrush [*Pinus ponderosa*/*Artemisia tridentata* var. *vaseyana*-*Purshia tridentata* var. *tridentata*] (Smith 1994)
- \*87.010.26 Ponderosa Pine / Service Berry - Choke Cherry [*Pinus ponderosa*/*Amelanchier alnifolia*-*Prunus virginiana*] (Smith 1994)
- \*87.010.27 Ponderosa Pine / Service Berry - Creeping Oregon-grape /Heartleaf Arnica [*Pinus ponderosa*/*Amelanchier alnifolia*-*Berberis repens*/*Arnica cordifolia*] (Smith 1994)
- \*87.010.28 Ponderosa Pine / Tobacco Bush / Columbia Needlegrass [*Pinus ponderosa*/*Ceanothus velutinus*/*Stipa nelsonii*] (Smith 1994)

- \*87.010.29 Ponderosa Pine / Desert Snowberry [*Pinus ponderosa/Symphoricarpos longiflorus*] (Vora 1988)
- \*87.010.30 Ponderosa Pine - Canyon Live Oak [*Pinus ponderosa-Quercus chrysolepis*] (Waddell 1982)
- \*87.010.31 Maritime Coast Range Ponderosa Pine Forest {84132}
- \*87.010.32 Ponderosa Dune Forest {84221}
- \*87.010.33 Westside Ponderosa Pine Forest {84210}
- \*87.010.34 Eastside Ponderosa Pine Forest {84220}
- 87.010.35 Upland Coast Range Ponderosa Pine Forest {84131}
- 87.010.36 Ponderosa Pine / Whiteleaf Manzanita / Ripgut Brome [*Pinus ponderosa/Arctostaphylos viscida/Bromus diandrus*] (Keeler-Wolf and Moore 2001)
  
- 87.015.00 Ponderosa Pine - Incense Cedar Forest [*Pinus ponderosa-Calocedrus decurrens*] (Keeler-Wolf and Moore 2001)
  - 87.015.02 Ponderosa Pine - Incense Cedar - Black Oak [*Pinus ponderosa-Calocedrus decurrens-Quercus kelloggii*] (Keeler-Wolf and Moore 2001)
  - 87.015.03 Ponderosa Pine - Incense Cedar / Mountain Misery [*Pinus ponderosa-Calocedrus decurrens/Chamaebatia foliosa*] (Keeler-Wolf and Moore 2001)
  - 87.015.04 Ponderosa Pine - Incense Cedar-Canyon Oak / Mountain Misery [*Pinus ponderosa-Calocedrus decurrens-Quercus chrysolepis/Chamaebatia foliosa*] (Fites 1993, re-named Keeler-Wolf and Moore 2001)
  - 87.015.05 Ponderosa Pine –Incense-cedar /Huckleberry Oak [ *Pinus ponderosa Mixed Conifer /Quercus vaccinifolia*] (Fites 1993)
  - 87.015.06 Ponderosa Pine - Incense Cedar - Canyon Live Oak / Bolander Bedstraw [Mixed Conifer-*Quercus chrysolepis/Galium bolanderi*] (Fites 1993)
  - 87.015.07 Ponderosa pine- Incense Cedar/Bearclover/Bolander Bedstraw [Ponderosa pine-mixed conifer/*Chamaebatia foliosa/Galium bolanderi*] (Fites 1993)
  
- 87.020.00 Jeffrey Pine Forest and Woodland [*Pinus jeffreyi*]
  - 87.020.01 Jeffrey Pine / Sadler Oak / Bear-grass [*Pinus jeffreyi/Quercus sadleriana/Xerophyllum tenax*] (Jimerson 1993)
  - \*87.020.02 Jeffrey Pine - Douglas-fir / Huckleberry Oak / California Fescue [*Pinus jeffreyi-Pseudotsuga menziesii/Quercus vaccinifolia/Festuca californica*] (Jimerson 1993)
  - \*87.020.03 Jeffrey Pine / Idaho Fescue [*Pinus jeffreyi/Festuca idahoensis*] (Duebendorfer 1987, Jimerson 1993)
  - 87.020.04 Jeffrey Pine - Incense-cedar / Buckbrush [*Pinus jeffreyi-Calocedrus decurrens/Ceanothus cuneatus*] (Jimerson 1993)
  - 87.020.05 Jeffrey Pine - Incense-cedar / Huckleberry Oak / Bear-grass [*Pinus jeffreyi-Calocedrus decurrens/Quercus vaccinifolia/Xerophyllum tenax*] (Jimerson 1993)
  - \*87.020.06 moved to Jeffrey Pine-Fir alliance
  - 87.020.07 Jeffrey Pine [*Pinus jeffreyi*] (Potter 1994)
  - 87.020.08 Jeffrey Pine / Huckleberry Oak [*Pinus jeffreyi/Quercus vaccinifolia*] (Potter 1994)
  - 87.020.09 Jeffrey Pine / Greenleaf Manzanita [*Pinus jeffreyi/Arctostaphylos patula*] (Potter 1994)
  - 87.020.10 Jeffrey Pine / Mountain Whitethorn [*Pinus jeffreyi/Ceanothus cordulatus*] (Potter 1994)
  - 87.020.11 Jeffrey Pine / Tailed Lupine [*Pinus jeffreyi/Lupinus caudatus*] (Riegel et al. 1990)

- \*87.020.12 Jeffrey Pine / Antelope Bitterbrush/ Mule's Ears [*Pinus jeffreyi*/*Purshia tridentata* var. *tridentata*/*Wyethia mollis*] (Smith 1994)
- \*87.020.13 Jeffrey Pine / Antelope Bitterbrush - Curlleaf Mountain-mahogany / Western Needlegrass [*Pinus jeffreyi*/*Purshia tridentata* var. *tridentata*/*Cercocarpus ledifolius*/*Stipa occidentalis*] (Smith 1994)
- \*87.020.14 Jeffrey Pine / Antelope Bitterbrush - Desert Snowberry / Wheeler Bluegrass [*Pinus jeffreyi*/*Purshia tridentata* var. *tridentata*-*Symphoricarpos longiflorus*/*Poa wheeleri*] (Smith 1994)
- \*87.020.15 Jeffrey Pine - Black Oak / One-sided Bluegrass [*Pinus jeffreyi*-*Quercus kelloggii*/*Poa secunda*] (Smith 1994)
- \*87.020.16 Jeffrey Pine - Black Oak / Basket Bush [*Pinus jeffreyi*-*Quercus kelloggii*/*Rhus trilobata*] (Smith 1994)
- \*87.020.17 Jeffrey Pine / Curlleaf Mountain-mahogany [*Pinus jeffreyi*/*Cercocarpus ledifolius*] (Smith 1994)
- \*87.020.18 Jeffrey Pine / Desert Snowberry / Wheeler Bluegrass [*Pinus jeffreyi*/*Symphoricarpos longiflorus*/*Poa wheeleri*] (Smith 1994)
- \*87.020.19 Jeffrey Pine / Mountain Big Sagebrush / Idaho Fescue [*Pinus jeffreyi*/*Artemisia tridentata* var. *vaseyana*/*Festuca idahoensis*] (Smith 1994)
- \*87.020.20 Jeffrey Pine / Bush Chinquapin [*Pinus jeffreyi*/*Chrysolepis sempervirens*] (Talley 1978)
- \*87.020.21 Jeffrey Pine / Antelope Bitterbrush [*Pinus jeffreyi*/*Purshia tridentata* var. *tridentata*] (Taylor 1980)
- \*87.020.22 Jeffrey Pine / Serpentine-Haplopappus [*Pinus jeffreyi*/*Ericameria ophitidis*] (Taylor & Teare 1979)
- \*87.020.23 Jeffrey Pine / Tufted Reedgrass [*Pinus jeffreyi*/*Calamagrostis koelerioides*] (Taylor & Teare 1979b)
- 87.020.24 Jeffrey Pine / Pinemat Manzanita [*Pinus jeffreyi*/*Arctostaphylos nevadensis*] (Waddell 1982)
- 87.020.25 Northern Ultramafic Jeffrey Pine Forest {84121}
- 87.020.26 Jeffrey Pine - Singleleaf Pinyon [*Pinus jeffreyi*-*Pinus monophylla*] (Keeler-Wolf and Moore 2001)
- 87.020.27 Jeffrey Pine/Huckleberry Oak-Pinemat Manzanita/Idaho Fescue [*Pinus jeffreyi*/*Quercus vaccinifolia*-*Arctostaphylos nevadensis*/*Festuca idahoensis*] (Jimerson et al. 1995)
- 87.020.28 Jeffrey Pine-Incense-cedar/Siskiyou mat [*Pinus jeffreyi*-*Calocedrus decurrens*/*Ceanothus pumila*] (Jimerson et al. 1995)
- \*87.020.29 *Pseudotsuga menziesii* - *Pinus jeffreyi*/*Festuca californica* association (Jimerson et al. 1995)
- \*87.020.30 Jeffrey Pine-Port Orford-cedar/Huckleberry Oak [*Pinus jeffreyi*-*Chamaecyparis lawsoniana*/ *Quercus vaccinifolia*] (Jimerson et al. 1999)
  
- \*87.030.00 Parry Pinyon Woodland [*Pinus quadrifolia*]
  
- 87.040.00 Singleleaf Pinyon Woodland [*Pinus monophylla*] {72122}
- 87.040.01 Mojavean Pinyon Woodland {72210}
- 87.040.02 Singleleaf Pinyon / Big Sagebrush [*Pinus monophylla*/*Artemisia tridentata*] (Keeler-Wolf and Thomas 2000)
- 87.040.03 Singleleaf Pinyon / Green Ephedra [*Pinus monophylla*/*Ephedra viridis*] (Keeler-Wolf and Thomas 2000)
- 87.040.04 Singleleaf Pinyon / Waxberry - Desert Gooseberry [*Pinus monophylla* /*Symphoricarpos rotundifolia*-*Ribes velutinum*] (Keeler-Wolf and Thomas 2000)
- 87.040.05 Singleleaf Pinyon / Silk Tassle Bush [*Pinus monophylla*/*Garrya flavescens*] (Keeler-Wolf and Thomas 2000)

- 87.040.06 Singleleaf Pinyon / Utah Juniper / Big Sagebrush - Blackbush [*Pinus monophylla*/*Juniperus osteosperma*/*Artemisia tridentata*-*Coleogyne ramosissisima*] (Keeler-Wolf and Thomas 2000)
- 87.040.07 Singleleaf Pinyon / Utah Juniper / Black Sagebrush [*Pinus monophylla*/*Juniperus osteosperma*/*Artemisia nova*] (Keeler-Wolf and Thomas 2000)
- 87.040.08 Singleleaf Pinyon / Muller Oak [*Pinus monophylla*/*Quercus cornelius-mulleri*] (Keeler-Wolf 2000)
- 87.040.09 Singleleaf Pinyon / Muller Oak / California Fiddleleaf [*Pinus monophylla*/*Quercus cornelius-mulleri*/*Nama californica*] (Keeler-Wolf and Thomas 2000)
- 87.040.10 Singleleaf Pinyon / Desert Almond [*Pinus monophylla*/*Prunus fasciculata*] (Keeler-Wolf and Thomas 2000)
- 87.040.11 Singleleaf Pinyon / Desert Gooseberry [*Pinus monophylla*/*Ribes velutinum*] (Keeler-Wolf and Thomas 2000)
- 87.040.12 Singleleaf Pinyon / Curl-leaf Mountain Mahogany / Big Sagebrush - Antelope Bitterbrush [*Pinus monophylla*/*Cercocarpus ledifolius*/*Artemisia tridentata*-*Purshia tridentata*] (Keeler-Wolf and Thomas 2000)
- 87.040.13 Singleleaf Pinyon / Utah Juniper / Antelope Brush [*Pinus monophylla*/*Juniperus osteosperma*/*Purshia mexicana*] (Keeler-Wolf and Thomas 2000)
- \*87.050.00 Twoleaf Pinyon Unique Stands [*Pinus edulis*]
- \*87.060.00 Beach Pine Forest [*Pinus contorta* ssp. *contorta*]
- \*87.060.01 Beach Pine Forest {83110}
- \*87.070.00 Bishop Pine Forests [*Pinus muricata*] {83120}
- 87.070.01 Bishop Pine - Pacific Madrone / Black Huckleberry [*Pinus muricata*-*Arbutus menziesii*/*Vaccinium ovatum*] (Keeler-Wolf, et al. 2001)
- \*87.071.00 Northern Bishop Pine Forest [*Pinus* spp.] {83121}
- \*87.071.01 Bishop Pine / Bear-grass [*Pinus muricata*/*Xerophyllum tenax*] (Westman & Whittaker 1975)
- \*87.071.02 Bishop Pine - Bolander Pine / Labrador-tea [*Pinus muricata*-*Pinus contorta* ssp. *bolanderi*] (Westman and Whittaker 1975)
- \*87.071.03 Bishop Pine - Bolander Pine / Rayless Arnica [*Pinus muricata*-*Pinus contorta* ssp. *bolanderi*/*Arnica discoidea*] (Westman & Whittaker 1975)
- \*87.071.04 Bishop Pine - Douglas-fir [*Pinus muricata*-*Pseudotsuga menziesii*] (Westman & Whittaker 1975)
- \*87.072.00 Southern Bishop Pine Forest [*Pinus* spp.] {83122}
- 87.080.00 Lodgepole Pine Forest and Woodland [*Pinus contorta* ssp. *murrayana*] {86100}
- 87.080.01 Lodgepole Pine [*Pinus contorta* ssp. *murrayana*] (Potter 1994)
- 87.080.02 Lodgepole Pine / Big Sagebrush [*Pinus contorta* ssp. *murrayana*/*Artemisia tridentata*] (Potter 1994)
- 87.080.03 Lodgepole Pine / Gray Lovage [*Pinus contorta* ssp. *murrayana*/*Ligusticum grayi*] (Potter 1994)
- 87.080.04 Lodgepole Pine / Open [*Pinus contorta* ssp. *murrayana*/Open] (Potter 1994)
- 87.080.05 Lodgepole Pine / Pussypaws [*Pinus contorta* ssp. *murrayana*/*Calyptridium monosperma*] (Taylor 1980)
- 87.080.06 Lodgepole Pine / Ross Sedge [*Pinus contorta* ssp. *murrayana*/*Carex rossii*] (Taylor 1984)

- 87.080.07 Lodgepole Pine / Fendler Meadow-rue [*Pinus contorta* ssp. *murrayana*/*Thalictrum fendleri*] (Taylor 1984)
- 87.080.08 Lodgepole Pine / Labrador-Tea [*Pinus contorta* ssp. *murrayana*/*Ledum glandulosum*] (Taylor 1984)
- 87.080.09 Lodgepole Pine / Western Blueberry [*Pinus contorta* ssp. *murrayana*/*Vaccinium uliginosum*] (Keeler-Wolf and Moore 2001)
- 87.080.10 Lodgepole Pine / Shorthair Sedge [*Pinus contorta* ssp. *murrayana*/*Carex filifolia*] (Keeler-Wolf and Moore 2001)
- 87.080.11 Lodgepole Pine - Whitebark Pine / Ross Sedge [*Pinus contorta* ssp. *murrayana*-*Pinus albicaulis*/*Carex rossii*] (Keeler-Wolf and Moore 2001)
- 87.080.12 Lodgepole Pine / Mountain Pride Penstemon [*Pinus contorta* ssp. *murrayana*/*Penstemon newberryi*] (Keeler-Wolf and Moore 2001)
- 87.090.00 Coulter Pine Woodland [*Pinus coulteri*] {84140}
- 87.092.00 Coulter Pine / Eastwood Manzanita Woodland [*Pinus coulteri*/*Arctostaphylos glandulosa*] (Borchert, *et al.* 2000)
- 87.100.00 Knobcone Pine Forest and Woodland [*Pinus attenuata*] {83210}
- 87.100.01 Knobcone Pine / Hairy Manzanita [*Pinus attenuata*/*Arctostaphylos columbiana*] (Imper 1991a)
- 87.100.02 Knobcone Pine / Greenleaf Manzanita [*Pinus attenuata*/*Arctostaphylos patula*] (Imper 1991b)
- 87.100.03 Knobcone Pine / Huckleberry Oak [*Pinus attenuata*/*Quercus vaccinifolia*] (Taylor & Teare 1979a)
- 87.100.04 Knobcone Pine / Chamise [*Pinus attenuata*/*Adenostoma fasciculata*] (Keeler-Wolf and Moore 2001)
- 87.100.05 Knobcone Pine / Whiteleaf Manzanita [*Pinus attenuata*/*Arctostaphylos viscida*] (Keeler-Wolf and Moore 2001)
- \*87.110.00 Monterey Pine Forest [*Pinus radiata*] {83130}
- \*87.120.00 Washoe Pine Woodland [*Pinus washoensis*] {85220}
- \*87.120.01 Washoe Pine / Tailed Lupine [*Pinus washoensis*/*Lupinus caudatus*] (Riegel *et al.* 1990)\*
- \*87.120.02 Washoe Pine / Desert Snowberry / Sticky Starwort [*Pinus washoensis*/*Symphoricarpos longiflorus*/*Pseudostellaria jamesiana*] (Smith 1994)
- \*87.120.03 Washoe Pine / Pinemat Manzanita [*Pinus washoensis*/*Arctostaphylos nevadensis*] (Smith 1994)
- 87.130.00 Foothill Pine Woodland [*Pinus sabiniana*] {71300}
- 87.130.01 Serpentine Digger Pine Chaparral Woodland {71321}
- 87.130.02 Non-Serpentine Digger Pine Chaparral Woodland {71322}
- 87.130.03 Digger Pine-Oak Woodland {71410}
- 87.130.04 Foothill Pine - Interior Live Oak / Wedgeleaf Ceanothus [*Pinus sabiniana*-*Quercus wislizeni*/*Ceanothus cuneatus*] (Keeler-Wolf and Moore 2001)
- 87.130.05 Foothill Pine - Interior Live Oak / Whiteleaf Manzanita [*Pinus sabiniana*- *Quercus wislizeni*/*Arctostaphylos viscida*] (Keeler-Wolf and Moore 2001)
- \*87.140.00 Bristlecone Pine Woodland [*Pinus longaeva*] {86400}
- \*87.140.01 Bristlecone Pine [*Pinus longaeva*] (Taylor 1979)

- \*87.140.02 Bristlecone Pine / Littleleaf Mountain-mahogany [*Pinus longaeva/Cercocarpus intricatus*] (Taylor 1979)
- 87.150.00 Foxtail Pine Woodland [*Pinus balfouriana*] {86300}
  - 87.150.01 Sierra Foxtail Pine Forest [*Pinus* spp.] (Ball 1976)
  - 87.150.02 Foxtail Pine Forest / Drummond Windflower [*Pinus balfouriana/Anemone drummondii*] (Whipple & Cope 1979)
- 87.160.00 Limber Pine Forest and Woodland [*Pinus flexilis*] {86700}
  - \*87.160.01 Limber Pine / Curlleaf Mountain-mahogany [*Pinus flexilis/Cercocarpus ledifolius*] (Taylor 1979)
- 87.170.00 Western White Pine Woodland [*Pinus monticola*]
  - \*87.170.01 Western White Pine / Bush Tanoak [*Pinus monticola/Lithocarpus densiflora* var. *echinoides*] (Duebendorfer 1987)
  - \*87.170.02 Western White Pine / Ocean Spray [*Pinus monticola/Holodiscus discolor*] (Sawyer & Thornburgh 1977)
  - \*87.170.03 Pine / Bear-grass [*Pinus* spp./*Xerophyllum tenax*] (Simpson 1980)
  - \*87.170.04 Western White Pine / Angelica [*Pinus monticola/Angelica arguta*] (Whipple & Cope 1979)
  - \*87.170.05 Ultramafic White Pine Forest {84160}
  - 87.170.06 Western White Pine / Western Needlegrass [*Pinus monticola/Achnatherum occidentale*] (Keeler-Wolf and Moore 2001)
  - 87.170.07 Western White Pine - Lodgepole Pine [*Pinus monticola-Pinus contorta* var. *murrayana*] (Keeler-Wolf and Moore 2001)
  - \*87.170.08 Western White Pine –Del Norte Lodgepole Pine/Dwarf Tanbark-Pacific Rhododendron [*Pinus monticola-Pinus contorta* ssp. *contorta/Lithocarpus densiflorus* ssp. *echinoides*] (Jimerson et al 1995)
  - \*87.170.09 Western White Pine-Sugar Pine/Huckleberry Oak-Dwarf Tanbark [*Pinus monticola-Pinus lambertiana/Quercus vaccinifolia-Lithocarpus densiflorus* ssp. *echinoides*] (Jimerson et al. 1995)
  - \*87.170.10 Western White Pine - Douglas-fir/Huckleberry Oak-Dwarf Tanbark [*Pinus monticola-Pseudotsuga menziesii/Quercus vaccinifolia-Lithocarpus densiflorus* ssp. *echinoides*] (Jimerson et al. 1995)
- 87.180.00 Whitebark Pine Woodland [*Pinus albicaulis*] {86600}
  - 87.180.01 Whitebark Pine / California Needlegrass [*Pinus albicaulis/Stipa californica*] (Reigel et al. 1990)
  - 87.180.02 Whitebark Pine / Slender Penstemon [*Pinus albicaulis/Penstemon gracilentus*] (Reigel et al. 1990)
  - 87.180.03 Whitebark Pine / Woody Sandwort [*Pinus albicaulis/Arenaria pumicola*] (Reigel et al. 1990)
  - 87.180.04 Whitebark Pine / Ocean Spray [*Pinus albicaulis/Holodiscus discolor*] (Sawyer & Thornburgh 1977)
  - 87.180.05 Whitebark Pine / Wheeler Bluegrass [*Pinus albicaulis/Poa wheeleri*] (Taylor 1984)
  - 87.180.06 Whitebark Pine / Davidson Penstemon [*Pinus albicaulis/Penstemon davidsonii*] (Taylor 1984)
  - 87.180.07 Whitebark Pine - Mountain Hemlock [*Pinus albicaulis/Tsuga mertensiana*] (Keeler-Wolf and Moore 2001)
  - 87.180.08 Whitebark Pine / Shorthair Sedge [*Pinus albicaulis/Carex filifolia*] (Keeler-Wolf and Moore 2001)

- 87.180.09 Whitebark Pine / Ross Sedge [*Pinus albicaulis*/*Carex rossii*] (Keeler-Wolf and Moore 2001)
- \*87.190.00 Torrey Pine Unique Stands [*Pinus torreyana*] {83140}
- 87.200.00 Jeffrey Pine - Ponderosa Pine Forest and Woodland [*Pinus jeffreyi*-*Pinus ponderosa*]
- \*87.200.01 Jeffrey Pine - Ponderosa Pine / Arrowleaf Balsam Root [*Pinus jeffreyi*-*Pinus ponderosa*/*Balsamorhiza sagittata*] (Smith 1994)
- \*87.200.02 Jeffrey Pine - Ponderosa Pine / Antelope Bitterbrush /Idaho Fescue [*Pinus jeffreyi*-*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*/*Festuca idahoensis*] (Smith 1994)
- \*87.200.03 Jeffrey Pine - Ponderosa Pine / Antelope Bitterbrush /Idaho Fescue / Granite [*Pinus jeffreyi*-*Pinus ponderosa*/*Purshia tridentata* var. *tridentata*/*Festuca idahoensis*/Granite] (Smith 1994)
- \*87.200.04 Jeffrey Pine - Ponderosa Pine / Modoc Coffeeberry / One-sided Bluegrass [*Pinus jeffreyi*-*Pinus ponderosa*/*Rhamnus rubra*/*Poa secunda*] (Smith 1994)
- \*87.200.05 Jeffrey Pine - Ponderosa Pine / Huckleberry Oak [*Pinus jeffreyi*-*Pinus ponderosa*/*Quercus vaccinifolia*] (Smith 1994)
- \*87.200.06 Jeffrey Pine - Ponderosa Pine / Columbia Needlegrass / Oregon Ash [*Pinus jeffreyi*-*Pinus ponderosa*/*Stipa nelsonii*/*Fraxinus latifolia*] (Smith 1994)
- \*87.200.07 Jeffrey Pine - Ponderosa Pine / Creeping Snowberry /Mule's Ears [*Pinus jeffreyi*-*Pinus ponderosa*/*Symphoricarpos mollis*/*Wyethia mollis*] (Smith 1994)
- 87.205.00 Jeffrey Pine-White Fir Forest {85210}
- 87.205.01 Jeffrey Pine - Red Fir [*Pinus jeffreyi*-*Abies magnifica*] (Potter 1994)
- 87.205.02 Jeffrey Pine - White Fir / Big sagebrush/squirreltail[*Pinus jeffreyi*-*Abies concolor*/*Artemisia tridentata*/*Elymus elymoides*] (Keeler-Wolf and Moore 2001)
- 87.205.03 Jeffrey Pine - White Fir - Red Fir [*Pinus jeffreyi*-*Abies magnifica*] (Potter 1994)
- 87.205.04 White Fir - Jeffrey Pine / California Fescue [*Abies concolor*-*Pinus jeffreyi*/*Festuca californica*] (Jimmerson 1993)
- 87.205.05 Jeffrey Pine-White fir/Sadler oak [*Pinus jeffreyi*-*Abies concolor*/*Quercus sadleriana*] (Jimerson 1993)
- 87.205.06 Jeffrey Pine - White Fir / Del Norte Iris [*Pinus jeffreyi*-*Abies concolor*/*Iris innominata*] (Jimerson 1993)
- 87.206.00 Sugar Pine Forest and Woodland
- 87.206.01 Sugar Pine/Chinquapin/Huckleberry Oak-Sadler Oak [*Pinus lambertiana*/*Chrysolepis chrysophylla*/*Quercus vaccinifolia*-*Quercus sadleriana*] (Jimerson et al. 1995)
- 87.206.02 Sugar Pine-Lodgepole Pine/Huckleberry oak-Dwarf Tanbark Oak [*Pinus lambertiana*-*Pinus contorta*/*Quercus vaccinifolia*-*Lithocarpus densiflora* var. *echinoides*] (Jimerson et al. 1995)
- 87.206.03 Sugar Pine-Lodgepole Pine/Huckleberry oak-Pacific Rhododendron [*Pinus lambertiana*-*Pinus contorta*/*Quercus vaccinifolia*-*Rhododensron macrophyllum*] (Jimerson et al. 1995)
- 87.206.04 Sugar pine-Western White Pine/Huckleberry oak-Dwarf Silktassel [*Pinus lambertiana*-*Pinus monticola*/*Quercus vaccinifolia*-*Garrya buxifolia*] (Jimerson et al. 1995)
- 87.210.00 Coulter Pine - Canyon Live Oak Woodland [*Pinus coulteri*-*Quercus chrysolepis*]

- 87.220.00 Mixed Subalpine Forest [*Pinus* spp.]
  - 87.220.01 Whitebark Pine Mountain Hemlock Forest {86210}
- 87.221.00 Southern California Subalpine Forest {86500}
- \*87.230.00 San Benito Unique Stands
- 88.000.00 Forest and Woodland dominated by Fir [*Abies* spp.]
  - \*88.100.00 Grand Fir Forest [*Abies grandis*]
    - \*88.100.01 Grand Fir Forest {82120}
  - 88.200.00 Red Fir Forest [*Abies magnifica* var. *magnifica*] {85310}
    - 88.200.01 Shasta Fir / Sadler Oak [*Abies magnifica* var. *shastensis/Quercus sadleriana*] (Imper 1988a)
    - \*88.200.02 Shasta Fir / Thinleaf Huckleberry [*Abies magnifica* var. *shastensis/Vaccinium membranaceum*] (Imper 1988a)
    - 88.200.03 Shasta Fir / Vanilla Leaf [*Abies magnifica* var. *shastensis/Achlys triphylla*] (Imper 1988a)
    - 88.200.04 Shasta Fir / Pinemat Manzanita [*Abies magnifica* var. *shastensis/Arctostaphylos nevadensis*] (Imper 1988b)
    - 88.200.05 Shasta Fir / Prince's-pine [*Abies magnifica* var. *shastensis/Chimaphila umbellata*] (Sawyer & Thornburgh 1977, Imper 1988b)
    - 88.200.06 Shasta Fir / Slender Penstemon [*Abies magnifica* var. *shastensis/Penstemon gracilentus*] (Imper 1988b)
    - \*88.200.07 Port Orford-cedar - Red Fir / Sadler Oak - Thinleaf Huckleberry [*Chamaecyparis lawsoniana-Abies magnifica* var. *magnifica/Quercus sadleriana-Vaccinium membranaceum*] (Jimerson 1993)
    - 88.200.08 Red Fir / Sadler Oak [*Abies magnifica* var. *magnifica/Quercus sadleriana*] (Jimerson 1993)
    - 88.200.09 Red Fir / Sadler Oak - Pinemat Manzanita [*Abies magnifica* var. *magnifica/Quercus sadleriana-Arctostaphylos nevadensis*] (Jimerson 1993)
    - \*88.200.10 Red Fir - Incense-cedar [*Abies magnifica* var. *magnifica-Calocedrus decurrens*] (Jimerson 1993)
    - 88.200.11 Red Fir / One-sided Shinleaf [*Abies magnifica* var. *magnifica/Orthilia secunda*] (Jimerson 1993)
    - \*88.200.12 Red Fir / Rhododendron [*Abies magnifica* var. *magnifica/Rhododendron* spp.] (Jimerson 1993)
    - 88.200.13 Red Fir / White-veined Shinleaf [*Abies magnifica* var. *magnifica/Pyrola picta*] (Jimerson 1993)
    - \*88.200.14 Red Fir - Brewer Spruce / Sadler Oak -Thinleaf Huckleberry [*Abies magnifica* var. *magnifica-Picea breweriana/Quercus sadleriana-Vaccinium membranaceum*] (Jimerson 1993)
    - 88.200.15 Red Fir -Mountain Hemlock / One-sided Shinleaf [*Abies magnifica* var. *magnifica-Tsuga mertensiana/Orthilia secunda*] (Jimerson 1993)
    - 88.200.16 entry moved to 88.520.02
    - 88.200.17 entry moved to 88.520.03
    - 88.200.18 entry moved to 88.520.04
    - 88.200.19 entry moved to 88.520.05
    - 88.200.20 entry moved to 88.520.06
    - 88.200.21 entry moved to 88.520.07
    - 88.200.22 entry moved to 88.520.08
    - 88.200.23 Red Fir [*Abies magnifica* var. *magnifica*] (Potter 1994)

- 88.200.24 Red Fir / Lodgepole Pine / Whiteflower Hawkweed [*Abies magnifica* var. *magnifica*/*Pinus contorta* ssp. *murrayana*/*Hieracium albiflorum*] (Potter 1994)
- 88.200.25 Red Fir / Lodgepole Pine [*Abies magnifica* var. *magnifica*/*Pinus contorta* ssp. *murrayana*] (Potter 1994)
- 88.200.26 Red Fir / Mule's Ears [*Abies magnifica* var. *magnifica*/*Wyethia mollis*] (Potter 1994)
- 88.200.27 Red Fir / Pinemat Manzanita [*Abies magnifica* var. *magnifica*/*Arctostaphylos nevadensis*] (Potter 1994)
- 88.200.28 Red Fir / Western White Pine / Pinemat Manzanita [*Abies magnifica* var. *magnifica*/*Pinus monticola*/*Arctostaphylos nevadensis*] (Potter 1994)
- 88.200.29 Red Fir - Western White Pine - Lodgepole Pine [*Abies magnifica* var. *magnifica*-*Pinus monticola*-*Pinus contorta* ssp. *murrayana*] (Potter 1994)
- 88.200.30 Red Fir - Western White Pine [*Abies magnifica* var. *magnifica*-*Pinus monticola*] (Potter 1994)
- 88.200.31 Red Fir / Western White Pine / Bush Chinquapin [*Abies magnifica* var. *magnifica*/*Pinus monticola*/*Chrysolepis sempervirens*] (Potter 1994)
- 88.200.32 entry moved to 88.520.01
- 88.200.33 entry moved to 88.520.09
- 88.200.34 entry moved to 88.510.02
- 88.200.35 Shasta Fir / Black-laurel [*Abies magnifica* var. *shastensis*/*Leucothoe davisiae*] (Sawyer & Thornburgh 1977)
- 88.200.36 Shasta Fir / Huckleberry Oak [*Abies magnifica* var. *shastensis* /*Quercus vaccinifolia*] (Sawyer & Thornburgh 1977)
- 88.200.37 Shasta Fir / Twinflower [*Abies magnifica* var. *shastensis*/*Linnaea borealis*] (Sawyer & Thornburgh 1977)
- 88.200.38 Shasta Fir / White-veined Shinleaf [*Abies magnifica* var. *shastensis*/*Pyrola picta*] (Sawyer & Thornburgh 1977)
- 88.200.39 Shasta Fir / Pinemat Manzanita [*Abies magnifica* var. *shastensis*/*Arctostaphylos nevadensis*] (Simpson 1980)
- 88.200.40 Shasta Fir / Sadler Oak [*Abies magnifica* var. *shastensis*/*Quercus sadleriana*] (Simpson 1980)
- 88.200.41 Red Fir / Silver Bush Lupine [*Abies magnifica* var. *magnifica*/*Lupinus albifrons*] (Waddell 1982)
- 88.200.42 Red Fir / White-veined Shinleaf [*Abies magnifica* var. *magnifica*/*Pyrola picta*] (Waddell 1982)
- \*88.300.00 Santa Lucia Fir Woodland [*Abies bracteata*] {84120}
- 88.300.01 Santa Lucia Fir / Santa Lucia Bedstraw [*Abies bracteata*/*Galium clementis*] (NDDDB)
- 88.300.02 Santa Lucia Fir / Sword Fern [*Abies bracteata*/*Polystichum munitum*]
- \*88.400.00 Subalpine Fir Forest [*Abies lasiocarpa*]
- 88.500.00 White Fir Forest [*Abies concolor*] {85320}
- 88.500.01 White Fir / Bush Chinquapin [*Abies concolor*/*Chrysolepis sempervirens*] (Fites 1993)
- 88.500.02 White Fir / Creeping Snowberry / Kelloggia [*Abies concolor*/*Symphoricarpos mollis*/*Kelloggia galioides*] (Fites 1993)
- 88.500.03 White Fir - Pacific Dogwood / Bush Chinquapin [*Abies concolor*-*Cornus nuttallii*/*Chrysolepis sempervirens*] (Fites 1993)
- 88.500.04 White Fir - Pacific Dogwood / Hazel [*Abies concolor*-*Cornus nuttallii*/*Corylus cornuta*] (Fites 1993)
- 88.500.05 White Fir - Pacific Dogwood / Trail Plant [*Abies concolor*-*Cornus nuttallii*] (Fites 1993)
- 88.500.06 White Fir / Ross Sedge [*Abies concolor*/*Carex rossii*] (Fites 1993)
- 88.500.07 entry moved to 88.510.03

- 88.500.08 White Fir / Trail Plant [*Abies concolor*/*Adenocaulon bicolor*] (Fites 1993)
- \*88.500.09 White Fir / Vine Maple - Bush Chinquapin [*Abies concolor*/*Acer circinatum-Chrysolepis sempervirens*] (Fites 1993)
- 88.500.10 White Fir / Pinemat Manzanita [*Abies concolor*/*Arctostaphylos nevadensis*] (Imper 1988a)
- 88.500.11 White Fir / Prince's-pine [*Abies concolor*/*Chimaphila umbellata*] (Sawyer & Thornburgh 1977b, Imper 1988a)
- 88.500.12 White Fir / Vanilla Leaf [*Abies concolor*/*Achlys triphylla*] (Imper 1988a)
- \*88.500.13 moved to Port Orford Cedar Alliance
- 88.500.14 entry moved to 88.520.11
- 88.500.15 entry moved to 88.520.12
- 88.500.16 entry moved to 88.520.13
- 88.500.17 White Fir / Heartleaf Arnica [*Abies concolor*/*Arnica ordifolia*] (Jimerson 1993)
- 88.500.18 White Fir / Creeping Snowberry [*Abies concolor*/*Symphoricarpos mollis*] (Jimerson 1993)
- 88.500.19 White Fir - Douglas-fir / Bear-grass [*Abies concolor*-*Pseudotsuga menziesii*/*Xerophyllum tenax*] (Jimerson 1993)
- 88.500.20 White Fir - Douglas-fir / Bigleaf Maple [*Abies concolor*-*Pseudotsuga menziesii*/*Acer macrophyllum*] (Jimerson 1993)
- 88.500.21 White Fir - Douglas-fir / Heartleaf Arnica [*Abies concolor*-*Pseudotsuga menziesii*/*Arnica cordifolia*] (Jimerson 1993)
- 88.500.22 Moved to Douglas-fir alliance
- 88.500.23 White Fir - Douglas-fir / Sadler Oak [*Abies concolor*-*Pseudotsuga menziesii*/*Quercus sadleriana*] (Jimerson 1993)
- 88.500.24 Moved to Douglas-fir alliance
- 88.500.25 White Fir - Douglas-fir / Mountain Maple [*Abies concolor*-*Pseudotsuga menziesii*/*Acer glabrum*] (Jimerson 1993)
- \*88.500.26 moved to Douglas-fir alliance
- 88.500.27 White Fir - Douglas-fir / Vanilla Leaf [*Abies concolor*-*Pseudotsuga menziesii*/*Achlys triphylla*] (Jimerson 1993)
- 88.500.28 White Fir - Douglas-fir / Wild rose - Creeping Snowberry [*Abies concolor*-*Pseudotsuga menziesii*/*Rosa gymnocarpa*-*Symphoricarpos mollis*] (Jimerson 1993)
- 88.500.29 White Fir - Incense-cedar - Black Oak [*Abies concolor*-*Calocedrus decurrens*-*Quercus kelloggii*] (Jimerson 1993)
- 88.500.30 White Fir - Incense-cedar / Creeping Snowberry [*Abies concolor*-*Calocedrus decurrens*/*Symphoricarpos mollis*] (Jimerson 1993)
- 88.500.31 White Fir - Incense-cedar / White-veined Shinleaf [*Abies concolor*-*Calocedrus decurrens*/*Pyrola picta*] (Jimerson 1993)
- 88.500.32 White Fir / Little Prince's-pine - White-veined Shinleaf [*Abies concolor*/*Chimaphila menziesii*-*Pyrola picta*] (Jimerson 1993)
- 88.500.33 White Fir / Serviceberry [*Abies concolor*/*Amelanchier alnifolia*] (Jimerson 1993)
- 88.500.34 White Fir / Wild Rose [*Abies concolor*/*Rosa gymnocarpa*] (Jimerson 1993)
- 88.500.35 White Fir / Wild Rose - Creeping Snowberry [*Abies concolor*/*Rosa gymnocarpa*-*Symphoricarpos mollis*] (Jimerson 1993)
- 88.500.36 White Fir - Brewer Spruce / Sadler Oak - Thinleaf Huckleberry [*Abies concolor*-*Picea breweriana*/*Quercus sadleriana*-*Vaccinium membranaceum*] (Jimerson 1993)
- \*88.500.37 White Fir - Chinquapin [*Abies concolor*-*Chrysolepis chrysophylla*] (Jimerson 1993)
- \*88.500.38 White Fir - Chinquapin - Sugar Pine / Prince's-pine [*Abies concolor*-*Chrysolepis chrysophylla*-*Pinus lambertiana*/*chimaphila umbellata*] (Jimerson 1993)

- 88.500.39 White Fir - Douglas-fir / Alaska Oniongrass [*Abies concolor-Pseudotsuga menziesii/Melica subulata*] (Jimerson 1993)
- 88.500.40 Moved to Douglas-fir alliance
- 88.500.41 Moved to Douglas-fir alliance
- 88.500.42 Moved to Douglas-fir alliance
- 88.500.43 Moved to Douglas-fir alliance
- 88.500.44 Moved to Douglas-fir alliance
- 88.500.45 White Fir - Douglas-fir / Wild Rose - Twinflower - Creeping Snowberry [*Abies concolor-Pseudotsuga menziesii/Rosa gymnocarpa-Linnaea borealis-Symphoricarpos mollis*] (Jimerson 1993)
- 88.500.46 White Fir - Douglas-fir / Wild Rose - Twinflower [*Abies concolor-Pseudotsuga menziesii/Rosa gymnocarpa-Linnaea borealis*] (Jimerson 1993)
- 88.500.47 entry moved to 88.520.14
- 88.500.48 entry moved to 88.520.15
- 88.500.49 entry moved to 88.520.16
- 88.500.50 White Fir / Huckleberry Oak [*Abies concolor/Quercus vaccinifolia*] (Laidlaw-Holmes 1981)
- 88.500.51 White Fir / Bracken [*Abies concolor/Pteridium aquilinum*] (Sawyer 1981b)
- 88.500.52 White Fir / Sadler Oak [*Abies concolor/Quercus sadleriana*] (Sawyer 1981b)
- 88.500.53 White Fir / American Vetch [*Abies concolor/Vicia americana*] (Sawyer & Thornburgh 1977)
- 88.500.54 White Fir / Little Oregon-grape [*Abies concolor/Berberis nervosa*] (Sawyer & Thornburgh 1977)
- 88.500.55 White Fir / Prince's-pine [*Abies concolor/Chimaphila umbellata*] (Sawyer & Thornburgh 1977)
- 88.500.56 White Fir / Mahala Carpet [*Abies concolor/Ceanothus prostratus*] (Sawyer & Thornburgh 1977)
- 88.500.57 White Fir / Trillium [*Abies concolor/Trillium ovatum*] (Sawyer & Thornburgh 1977)
- 88.500.58 White Fir / Bitter Cherry [*Abies concolor/Prunus emarginata*] (Taylor & Randall 1977)
- 88.500.59 White Fir / Rattlesnake-plantain [*Abies concolor/Goodyera oblongifolia*] (Taylor & Randall 1977)
- 88.500.60 White Fir / Mountain Maple [*Abies concolor/Acer glabrum*] (Taylor & Teare 1979b)
- 88.500.61 White Fir / Sticky Starwort [*Abies concolor/Pseudostellaria jamesiana*] (Waddell 1982)
- 88.500.62 White Fir / White-veined Shinleaf [*Abies concolor/Pyrola picta*] (Waddell 1982)
- \*88.500.63 Desert Mountain White Fir Forest
- 88.500.64 Sierran White Fir Forest {84240}
- 88.500.65 Southern California White Fir Forest {85320}
- 88.500.66 White Fir / Mountain Whitehorn [*Abies concolor/Ceanothus cordulatus*] (Keeler-Wolf and Moore 2001)
- 88.510.00 White Fir - Sugar Pine Forest [*Abies concolor-Pinus lambertiana*] (Keeler-Wolf and Moore 2001)
- 88.510.01 White Fir - Sugar Pine [*Abies concolor-Pinus lambertiana*] (Keeler-Wolf and Moore 2001)
- 88.510.02 White Fir - Sugar Pine - Red Fir [*Abies concolor-Pinus lambertiana-Abies magnifica* var. *magnifica*] (Potter 1994)
- 88.510.03 White Fir - Sugar pine / False solomon's seal - Hooker fairybells [*Abies concolor-Pinus lambertiana/Smilacina racemosa-Disporum hookeri*] (Fites 1993)

- 88.510.04 White Fir - Sugar Pine - Jeffrey Pine [*Abies concolor*-*Pinus lambertiana*-*Pinus jeffreyi*] (Keeler-Wolf and Moore 2001)
- 88.510.05 White Fir - Sugar Pine - Incense Cedar / Pacific Dogwood / California Hazel [*Abies concolor*-*Pinus lambertiana*-*Calocedrus decurrens*/*Cornus nuttallii*/*Corylus cornuta* var. *californica*] (Keeler-Wolf and Moore 2001)
- 88.510.06 White Fir - Sugar Pine - Incense Cedar / Trail Plant [*Abies concolor*-*Pinus lambertiana*-*Calocedrus decurrens*/*Adenocaulon bicolor*] (*Sensu*. Fites 1993 *Abies concolor*-Mixed Conifer/*Adenocaulon bicolor*) (Keeler-Wolf and Moore 2001)
- 88.510.07 White Fir - Sugar Pine - Incense Cedar / Bush Chinquapin / Multi-stemmed Sedge [*Abies concolor*-*Pinus lambertiana*-*Calocedrus decurrens*/*Chrysolepis sempervirens*/*Carex multicaulis*] (*Sensu*. Fites 1993 *Abies concolor*-Mixed Conifer/*Chrysolepis sempervirens*) (Keeler-Wolf and Moore 2001)
- 88.510.08 White Fir - Sugar Pine - Incense Cedar / Creeping Snowberry / Kelloggia [*Abies concolor*-*Pinus lambertiana*-*Calocedrus decurrens*/*Symphoricarpos mollis*/*Kelloggia galioides*] (*Sensu*. Fites 1993 *Abies concolor*-Mixed Conifer/*Symphoricarpos mollis*/*Kelloggia galioides*) (Keeler-Wolf and Moore 2001)
- 88.520.00 Red Fir - White Fir Forest [*Abies magnifica* var. *magnifica*-*Abies concolor*] (Parker 1984, Parker 1982)
- 88.520.01 Red Fir - White Fir [*Abies magnifica* var. *magnifica*-*Abies concolor*] (Potter 1994)
- 88.520.02 Red Fir - White Fir / Bracken [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Pteridium aquilinum*] (Jimerson 1993)
- 88.520.03 Red Fir - White Fir / Heartleaf Arnica [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Arnica cordifolia*] (Jimerson 1993)
- 88.520.04 Red Fir - White Fir / Creeping Snowberry / White-veined Shinleaf [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Symphoricarpos mollis*/*Pyrola picta*] (Jimerson 1993)
- 88.520.05 Red Fir - White Fir / Creeping Snowberry - Wild Rose [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Symphoricarpos mollis*-*Rosa gymnocarpa*] (Jimerson 1993)
- 88.520.06 Red Fir - White Fir / Sadler Oak [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Quercus sadleriana*] (Jimerson 1993)
- 88.520.07 Red Fir - White Fir / Pinemat Manzanita [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Arctostaphylos nevadensis*] (Jimerson 1993)
- 88.520.08 Red Fir - White Fir / Vanilla Leaf [*Abies magnifica* var. *magnifica*-*Abies concolor*/*Achlys triphylla*] (Jimerson 1993)
- 88.520.09 Red Fir - White Fir - Jeffrey Pine [*Abies magnifica* var. *magnifica*-*Abies concolor*-*Pinus jeffreyi*] (Potter 1994)
- 88.520.10 Red Fir - White Fir - Sugar Pine [*Abies magnifica* var. *magnifica*-*Abies concolor*-*Pinus lambertiana*] (Potter 1994)
- 88.520.11 Shasta Fir - White Fir / Mountain Maple [*Abies magnifica* var. *shastensis*-*Abies concolor*/*Acer glabrum*] (Jimerson 1993)
- 88.520.12 Shasta Fir - White Fir / Pinemat Manzanita [*Abies magnifica* var. *shastensis*-*Abies concolor*/*Arctostaphylos nevadensis*] (Jimerson 1993)
- 88.520.13 Shasta Fir - White Fir / Trail Penstemon - Mountain Monardella [*Abies magnifica* var. *shastensis*-*Abies concolor*/*Penstemon anguineus*-*Monardella odoratissima*] (Jimerson 1993)
- 88.520.14 White Fir - Shasta Fir / Sadler Oak [*Abies concolor*-*Abies magnifica* var. *shastensis*/*Quercus sadleriana*] (Jimerson 1993)
- 88.520.15 White Fir - Shasta Fir / White-veined Shinleaf [*Abies concolor*-*Abies magnifica* var. *shastensis*/*Pyrola picta*] (Jimerson 1993)

- 88.520.16 White Fir - Shasta Fir / Threelobed Anemone [*Abies concolor*-*Abies magnifica* var. *shastensis*/*Anemone deltoidea*] (Jimerson 1993)
- 88.600.00 Mixed Conifer Forest {84230}
- \*88.600.01 Mixed Conifer / Bolander Bedstraw - Milkwort [Mixed Conifer/*Galium bolanderi*-*Polygala cornuta*] (Fites 1993)
- 88.600.02 Mixed Conifer / Huckleberry Oak [Mixed Conifer/*Quercus vaccinifolia*] (Fites 1993)
- 88.600.03 Mixed Conifer / Rosy Everlasting - Naked-stemmed Buckwheat [Mixed Conifer/*Antennaria rosea*-*Eriogonum latifolium*] (Fites 1993)
- 88.600.04 Mixed Conifer / Service Berry [Mixed Conifer/*Amelanchier alnifolia*] (Fites 1993)
- 88.600.05 moved to Ponderosa pine- Incense cedar alliance
- \*88.600.06 Mixed Conifer / Starflower [Mixed Conifer/*Trientalis latifolia*] (Fites 1993)
- 88.600.07 Mixed Conifer - Canyon Live Oak / Hazel [Mixed Conifer-*Quercus chrysolepis*/*Corylus cornuta*] (Fites 1993)??
- 88.600.08 moved to Ponderosa pine – Incense-cedar alliance
- 88.600.09 moved to Ponderosa pine – Incense-cedar alliance
- 88.600.10 Moved to Douglas-fir – Canyon live oak Alliance
- \*88.600.11 Mixed Conifer – Tanoak / Mountain Dogwood [Mixed Conifer-*Quercus chrysolepis*/*Cornus nuttallii*] (Fites 1993)
- \*88.600.12 Moved to White fir - Sugar Pine Alliance
- 88.600.13 Mixed Conifer / Little Oregon-grape [Mixed Conifer/*Berberis nervosa*] (Sawyer & Thornburgh 1977)
- 88.600.14 Mixed Conifer / Mahala Carpet [Mixed Conifer/*Ceanothus prostratus*] (Sawyer & Thornburgh 1977)
- 88.600.15 Southern Ultramafic Mixed Coniferous Forest {84182}
- 88.600.16 Coast Range Mixed Coniferous Forest {84110}
- 88.600.17 Ultramafic Mixed Coniferous Forest {84180}
- 88.600.18 Sierran Mixed Coniferous Forest {84230}
- \*88.700.00 Klamath Enriched Conifer Unique Stands {85400}{85410}{85420}
- \*88.800.00 Pacific Silver Fir Unique Stands [*Abies amabilis*]
- 89.000.00 Juniper Woodlands [*Juniperus* spp.]
- 89.100.00 California Juniper Woodland and Scrub [*Juniperus californica*]
- \*89.100.01 Juniper - Oak Cismontane Woodland {71430}
- \*89.100.02 Cismontane Juniper Woodland & Scrub {72400}
- 89.100.03 California Juniper - Desert Agave [*Juniperus californica*-*Agave deserti*] (Keeler-Wolf *et al*, 1998)
- 89.100.04 California Juniper / Blackbush [*Juniperus californica*/*Coleogyne ramosissima*] (Keeler-Wolf *et al*, 1998)
- 89.100.05 California Juniper - Muller Oak / Blackbush [*Juniperus californica*-*Quercus cornelius-mulleri*/*Coleogyne ramosissima*] (Keeler-Wolf and Thomas 2000)
- 89.100.06 California Juniper / Blackbush - Mojave Yucca [*Juniperus californica*/*Coleogyne ramosissima*-*Yucca schidigera*] (Keeler-Wolf and Thomas 2000)
- 89.100.07 California Juniper / Desert Needlegrass [*Juniperus californica*/*Achnatherum speciosum*] (Keeler-Wolf and Thomas 2000)
- 89.100.08 California Juniper - Mojave Yucca / Big Galleta [*Juniperus californica*-*Yucca schidigera*/*Pleuraphis rigida*] (Keeler-Wolf 2001)

- 89.100.09 California Juniper / Desert Needlegrass [*Juniperus californica/Achnatherum speciosum*] (Keeler-Wolf 2001)
- 89.100.10 California Juniper / California Buckwheat [*Juniperus californica/Eriogonum fasciculatum*] (Keeler-Wolf 2001)
- 89.100.11 California Juniper / Parry's Nolina [*Juniperus californica/Nolina parryi*] (Keeler-Wolf 2001)
- \*89.200.00 Mountain Juniper Woodland [*Juniperus occidentalis* ssp. *australis*]
- 89.200.01 Mountain Juniper [*Juniperus occidentalis* ssp. *australis*] (Potter 1994)
- 89.200.02 Mountain Juniper / Big Sagebrush [*Juniperus occidentalis* ssp. *australis/Artemisia tridentata*] (Potter 1994)
- 89.200.03 Mountain Juniper / Curl-leaf Mountain Mahogany / Big Sagebrush [*Juniperus occidentalis* ssp. *australis/Cercocarpus ledifolius/Artemisia tridentata*] (Keeler-Wolf and Moore 2001)
- 89.200.04 Mountain Juniper / Ocean Spray [*Juniperus occidentalis* ssp. *australis/Holodiscus discolor*] (Keeler-Wolf and Moore 2001)
- 89.300.00 Utah Juniper Woodland {72123}
- 89.300.01 Utah Juniper [*Juniperus osteosperma*] (Keeler-Wolf and Thomas 2000)
- 89.300.02 Utah Juniper / Big Sagebrush - Green Ephedra [*Juniperus osteosperma/Artemisia tridentata-Ephedra viridis*] (Keeler-Wolf and Thomas 2000)
- 89.300.03 Utah Juniper / Big Sagebrush - Desert Bitterbrush - Nevada Ephedra [*Juniperus osteosperma/Artemisia tridentata-Purshia glandulosa-Ephedra nevadensis*] (Keeler-Wolf and Thomas 2000)
- 89.300.04 Utah Juniper / California Buckwheat [*Juniperus osteosperma-Eriogonum fasciculatum*] (Keeler-Wolf and Thomas 2000)
- 89.300.05 Utah Juniper / Sticky Snakeweed [*Juniperus osteosperma/Gutierrezia microcephala*] (Keeler-Wolf and Thomas 2000)
- 89.300.06 Utah Juniper / Shadscale [*Juniperus osteosperma/Atriplex confertifolia*] (Keeler-Wolf and Thomas 2000)
- 89.300.07 Utah Juniper / White Bursage [*Juniperus osteosperma/Ambrosia dumosa*] (Keeler-Wolf and Thomas 2000)
- 89.300.08 Utah Juniper / Blackbush [*Juniperus osteosperma/Coleogyne ramosissima*] (Keeler-Wolf and Thomas 2000)
- 89.300.09 Utah Juniper / Blackbush / Galleta [*Juniperus osteosperma/Coleogyne ramosissima/Pleuraphis jamesii*] (Keeler-Wolf and Thomas 2000)
- 89.300.10 Utah Juniper / Spanish Bayonet [*Juniperus osteosperma/Yucca baccata*] (Keeler-Wolf and Thomas 2000)
- 89.300.11 Utah Juniper / Nevada Ephedra / Desert Needlegrass [*Juniperus osteosperma/Ephedra nevadensis/Achnantherium speciosum*] (Keeler-Wolf and Thomas 2000)
- 89.400.00 Western Juniper Woodland [*Juniperus occidentalis* ssp. *occidentalis*]
- 89.400.01 Northern Juniper Woodland {72110}
- 89.500.00 Singleleaf Pinyon - Utah Juniper Woodland [*Pinus monophylla-Juniperus* spp.] {72121}
- 89.600.00 Great Basin Woodlands {72100}
- 89.700.00 Mojave Juniper Woodland and Scrub {72220}
- 89.800.00 Peninsular Juniper Woodland and Scrub {72320}

90.000.00 ALPINE HABITATS

- 91.000.00 Boulder and Rock Field
- 91.100.00 Alpine Fell-field (= Alpine Habitat from book)
- 91.110.00 Klamath-Cascade Fell-field {91110}
- 91.120.00 Sierra Nevada Fell-field {91120}
- \*91.120.01 Sierra Primrose [*Primula suffrutenscens*] (Burke 1982)
  - 91.120.02 Alpine Pussypaws - Heretic Penstemon [*Antennaria alpina-Penstemon heterodoxus*] (Major & Taylor 1977)
  - 91.120.03 Alpine Pyrocoma [*Haplopappus aparigoides*] (Major & Taylor 1977)
  - 91.120.04 Dense Draba - Sweetwater Mountain Milkvetch [*Draba densiflora-Astragalus kentrophyta* var. *danaus*] (Major & Taylor 1977, Taylor 1984)
  - 91.120.05 Hairy Draba - Inyo Rock-cress [*Draba oligosperma-Arabis inyoensis*] (Major & Taylor 1977)
  - 91.120.06 Muir Ivesia [*Ivesia muirii*] (Major & Taylor 1977)
  - \*91.120.07 Netted Willow [*Salix nivalis*] (Major & Taylor 1977)
  - 91.120.08 Podistera - King Sandwort [*Podistera nevadensis-Arenaria kingii*] (Major & Taylor 1977)
  - 91.120.09 Podistera - Pygmy Daisy [*Podistera nevadensis-Erigeron pygmaeus*] (Major & Taylor 1977)
  - \*91.120.10 Sibbaldia - Merten Rush [*Sibbaldia procumbens-Juncus mertensianus*] (Major & Taylor 1977)
  - 91.120.11 Silky Raillardella - Tawny Buckwheat [*Raillardella argentea-Eriogonum incanum*] (Major & Taylor 1977)
  - 91.120.12 Stemless Haplopappus - Old Man's Whiskers [*Stenotus acaulis-Geum canescens*] (Major & Taylor 1977)
  - 91.120.13 Watson Spikemoss - Round-leaved Buckwheat [*Selaginella watsonii-Eriogonum ovalifolium*] (Major & Taylor 1977)
  - 91.120.14 Western Needlegrass - Nude Buckwheat [*Stipa occidentalis-Eriogonum nudum*] (Major & Taylor 1977)
  - \*91.120.15 Alpine Alumroot - Fragile Fern [*Heuchera rubescens-Cystopteris fragilis*] (Taylor 1984)
  - 91.120.16 entry moved to 38.120.03
  - \*91.120.17 entry moved to 91.125.01
  - 91.120.18 Alpine Sedum - Watson Spikemoss [*Sedum roseum-Selaginella watsonii*] (Taylor 1984)
  - 91.120.19 Alpine Smartweed [*Polygonum minimum*] (Taylor 1984)
  - \*91.120.20 Alpine Timothy - One-spike Oatgrass [*Phleum alpinum-Danthonia unispicata*] (Taylor 1984)
  - 91.120.21 Baltic Rush [*Juncus balticus*] (Taylor 1984)
  - \*91.120.22 entry moved to 61.216.00
  - 91.120.23 Cordilleran Arnica - Davidson Arabis [*Arnica mollis-Arabis davidsonii*] (Taylor 1984)
  - 91.120.24 Coville Phlox - Vagus Buckwheat [*Phlox pulvinata-Eriogonum incanum*] (Taylor 1984)
  - 91.120.25 King Ricegrass - Sierra Ragwort [*Ptilagrostis kingii-Senecio scorzonella*] (Taylor 1984)
  - 91.120.26 entry moved to 91.122.01
  - 91.120.27 Merten Rush [*Juncus mertensianus*] (Taylor 1984)
  - \*91.120.28 Moss Saxifrage [*Saxifraga bryophora*] (Taylor 1984)
  - 91.120.29 Mountain Sedum - Mountain Muhly [*Sedum obtusatum-Muhlenbergia montana*] (Taylor 1984)
  - 91.120.30 entry moved to 91.124.01
  - 91.120.31 Nevada Claytonia [*Claytonia nevadensis*] (Taylor 1984)
  - 91.120.32 Tiling Monkeyflower - One-sided Bluegrass [*Mimulus tilingii-Poa secunda*] (Taylor 1984)

- 91.120.33 entry moved to 38.120.01  
 91.120.34 entry moved to 41.560.01  
 91.120.35 Podistera - Pygmy Daisy [*Podistera nevadensis-Erigeron pygmaeus*] (Taylor 1984)  
 91.120.36 Showy Fescue - Davidson Penstemon [*Festuca minutiflora-Penstemon davidsonii*] (Taylor 1984)  
 91.120.37 Vagus Buckwheat - Silky Raillardella [*Eriogonum incanum-Raillardella argentea*] (Taylor 1984)  
 91.120.38 entry moved to 91.128.01
- 91.121.00 Alpine Hulsea [*Hulsea algida*] (Keeler-Wolf and Moore 2001)
- 91.122.00 Alpine Sorrel [*Oxyria digyna*] (Taylor 1984)  
 91.122.01 Lemmon Draba - Alpine Sorrel [*Draba lemmonii-Oxyria digyna*] (Taylor 1984)
- 91.123.00 Coville Phlox - Squirreltail [*Phlox covillei-Elymus elymoides*] (Taylor 1984)  
 91.123.01 Coville Phlox - Squirreltail - Alpine Podistera [*Phlox covillei-Elymus elymoides-Podistera nevadensis*] (Taylor 1984)  
 91.123.02 Coville Phlox - Squirreltail - Alpine Podistera - Pygmy Daisy [*Phlox covillei-Elymus elymoides-Podistera nevadensis-Erigeron pygmaeus*] (Taylor 1984)
- 91.124.00 Nested Saxifrage - Suksdorf Monkeyflower [*Saxifraga nidifica-Mimulus rubellus*] (Taylor 1984)  
 91.124.01 Nested Saxifrage - Suksdorf Monkeyflower [*Saxifraga nidifica-Mimulus suksdorfii*] (Taylor 1984)
- 91.125.00 Alpine Saxifrage [*Saxifraga tolmiei*] (Keeler-Wolf and Moore 2001)  
 \*91.125.01 Alpine Saxifrage - Woodrush [*Saxifraga tolmiei-Luzula divaricata*] (Taylor 1984)
- \*91.130.00 Southern California Fell-field {91130}
- 91.140.00 White Mountains Fell-field {91140}  
 91.140.01 Mason's Sky Pilot - Vagus Fleabane [*Polemonium chartaceum-Erigeron vagus*] (Major & Taylor 1977)  
 91.140.02 Coville Phlox - Inyo Buckwheat [*Phlox pulvinata-Eriogonum gracilipes*] (Major & Taylor 1977)
- 91.150.00 Sweetwater Mountains Fell-field  
 91.150.01 Compact Phlox - Gordon Ivesia [*Phlox pulvinata-Ivesia muirii*] (Major & Taylor 1977)  
 91.150.02 Compact Phlox - Alpine Phoenicaulis [*Phlox pulvinata-Anelsonia eurycarpa*] (Major & Taylor 1977)  
 91.150.03 Compact Phlox - Small Haplopappus - Alpine Ipomopsis [*Phlox pulvinata-Ericameria suffrutenscens-Ipomopsis congesta*] (Major & Taylor 1977)  
 91.150.04 Compact Phlox - Sweetwater Lupine [*Phlox pulvinata-Lupinus montigenus*] (Major & Taylor 1977)
- 91.160.00 Subalpine Upland Shrub Habitat {includes 94000}
- 91.200.00 Alpine and Talus Scree Slope{91200}
- 91.210.00 Wet Alpine Talus and Scree Slope{91210}

91.220.00	Dry Alpine Talus and Scree Slope{91220}
91.300.00	Alpine Snowbank Margin {91300}
92.000.00	Alpine Snow and Ice Habitat
92.100.00	Alpine Snowfield {93100}
92.200.00	Alpine Glacier {93200}
99.000.00	Non-Vegetated Desert
99.900.01	Sandy to Cobbly wash bottom
99.900.02	Gypsum
99.900.03	Mud hills
99.900.04	Low Elevation Rock Outcrop
99.900.05	Upper Elevation Rock Outcrop
99.900.07	Playa