# Mount St. Helens Eruption and Succession Data

*A Carolina Essentials™ Activity Resource*

**Mount St. Helens Succession Data Table**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Abraham Plain | 10 | 1995 | 0 | 0 | 0 | 0.2 | 0.1 | 0 |
| Abraham Plain | 10 | 1996 | 0 | 0 | 0 | 0.1 | 0.3 | 0 |
| Abraham Plain | 10 | 1997 | 0 | 0 | 0 | 0.1 | 0.1 | 0 |
| Abraham Plain | 10 | 1999 | 0 | 0 | 0 | 0.1 | 0.8 | 0 |
| Abraham Plain | 10 | 2000 | 0 | 0 | 0 | 0.1 | 0.8 | 0 |
| Abraham Plain | 10 | 2001 | 0 | 0 | 0 | 0.1 | 0.7 | 0 |
| Abraham Plain | 10 | 2002 | 0 | 0 | 0 | 0.1 | 1.8 | 0 |
| Abraham Plain | 10 | 2003 | 0 | 0 | 0 | 0.1 | 0.9 | 0 |
| Abraham Plain | 10 | 2004 | 0 | 0 | 0 | 0.1 | 1.5 | 0 |
| Abraham Plain | 10 | 2005 | 0 | 0 | 0 | 0.1 | 1.6 | 0 |
| Abraham Plain | 10 | 2006 | 0 | 0 | 0 | 0.1 | 2.2 | 0 |
| Abraham Plain | 10 | 2007 | 0 | 0 | 0 | 0.1 | 2.0 | 0 |
| Abraham Plain | 10 | 2008 | 0 | 0 | 0 | 0.1 | 2.8 | 0 |
| Abraham Plain | 10 | 2009 | 0 | 0 | 0 | 0.1 | 2.3 | 0 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Butte Camp | D 01 | 1980 | 0 | 0 | 1.8 | 0 | 0 | 3.3 |
| Butte Camp | D 01 | 1981 | 0 | 0.5 | 5.1 | 0 | 0 | 11.1 |
| Butte Camp | D 01 | 1982 | 0 | 0.3 | 3.6 | 0 | 0 | 3.1 |
| Butte Camp | D 01 | 1983 | 0 | 0.3 | 3.5 | 0 | 0 | 2.3 |
| Butte Camp | D 01 | 1984 | 0 | 0.1 | 1.4 | 0 | 0 | 1 |
| Butte Camp | D 01 | 1985 | 0 | 0.1 | 2.4 | 0 | 0 | 1.3 |
| Butte Camp | D 01 | 1986 | 0 | 0.1 | 1.5 | 0 | 0 | 0.7 |
| Butte Camp | D 01 | 1987 | 0 | 0.1 | 2.4 | 0 | 0 | 2.5 |
| Butte Camp | D 01 | 1988 | 0 | 0.1 | 1.2 | 0 | 0 | 3.1 |
| Butte Camp | D 01 | 1989 | 0.1 | 0.1 | 1.6 | 0 | 0 | 5.8 |
| Butte Camp | D 01 | 1990 | 0.1 | 0.1 | 1.1 | 0 | 0 | 6.7 |
| Butte Camp | D 01 | 1991 | 0.1 | 0.1 | 1 | 0 | 0 | 5.3 |
| Butte Camp | D 01 | 1992 | 0.1 | 0.3 | 1.3 | 0 | 0 | 3.5 |
| Butte Camp | D 01 | 1994 | 0.1 | 0.1 | 1.5 | 0 | 0 | 4.5 |
| Butte Camp | D 01 | 1996 | 0.1 | 0.1 | 0.9 | 0 | 0 | 2.3 |
| Butte Camp | D 01 | 1997 | 0.1 | 0.1 | 1.6 | 0 | 0 | 3.5 |
| Butte Camp | D 01 | 1998 | 0.1 | 0.1 | 1 | 0 | 0 | 1.5 |
| Butte Camp | D 01 | 2000 | 0.1 | 0.1 | 1.7 | 0.1 | 0 | 0.8 |
| Butte Camp | D 01 | 2002 | 0.1 | 0.1 | 1.4 | 0.1 | 0 | 1.5 |
| Butte Camp | D 01 | 2003 | 0.1 | 0.3 | 1.1 | 0.1 | 0 | 0.6 |
| Butte Camp | D 01 | 2004 | 0.1 | 0.1 | 1.5 | 0.1 | 0 | 0.1 |
| Butte Camp | D 01 | 2005 | 0.1 | 0.3 | 1.4 | 0.1 | 0 | 0.5 |
| Butte Camp | D 01 | 2007 | 0.1 | 0.1 | 1.6 | 0 | 0 | 0.1 |
| Butte Camp | D 01 | 2008 | 0.1 | 0 | 0.7 | 0 | 0 | 0.1 |
| Butte Camp | D 01 | 2009 | 0.1 | 0 | 1.2 | 0.1 | 0 | 0.5 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Butte Camp | A 04 | 1980 | 0 | 2.2 | 4.2 | 0 | 0 | 4.9 |
| Butte Camp | A 04 | 1981 | 0 | 3.7 | 10.8 | 0 | 0 | 15.2 |
| Butte Camp | A 04 | 1982 | 0.1 | 2.2 | 6.3 | 0 | 0 | 7.5 |
| Butte Camp | A 04 | 1983 | 0.1 | 1.1 | 6 | 0 | 0 | 3.6 |
| Butte Camp | A 04 | 1984 | 0 | 0.1 | 2.8 | 0 | 0 | 1.8 |
| Butte Camp | A 04 | 1985 | 0 | 0.1 | 1 | 0 | 0 | 0.1 |
| Butte Camp | A 04 | 1986 | 0 | 0.9 | 1.2 | 0 | 0 | 0.7 |
| Butte Camp | A 04 | 1987 | 0.1 | 1.5 | 1.8 | 0 | 0 | 2.5 |
| Butte Camp | A 04 | 1988 | 0.1 | 1 | 1.5 | 0 | 0 | 3.2 |
| Butte Camp | A 04 | 1989 | 0.1 | 0.7 | 2.1 | 0 | 0 | 7.6 |
| Butte Camp | A 04 | 1990 | 0.1 | 1.3 | 1.4 | 0 | 0 | 7 |
| Butte Camp | A 04 | 1991 | 0.1 | 0.5 | 1.3 | 0 | 0 | 8.5 |
| Butte Camp | A 04 | 1992 | 0.1 | 0.8 | 1.5 | 0 | 0 | 2.5 |
| Butte Camp | A 04 | 1994 | 0.1 | 0.5 | 2.7 | 0 | 0 | 7 |
| Butte Camp | A 04 | 1996 | 0.1 | 1 | 2.2 | 0 | 0 | 3.9 |
| Butte Camp | A 04 | 1997 | 0.1 | 0.7 | 1.3 | 0 | 0 | 5.8 |
| Butte Camp | A 04 | 1998 | 0.1 | 0.4 | 1.3 | 0 | 0 | 2.7 |
| Butte Camp | A 04 | 2000 | 0.1 | 0.5 | 2.8 | 0 | 0 | 2.5 |
| Butte Camp | A 04 | 2002 | 0.1 | 0.3 | 1.1 | 0 | 0 | 3.7 |
| Butte Camp | A 04 | 2003 | 0.2 | 0.6 | 0.9 | 0 | 0 | 1.7 |
| Butte Camp | A 04 | 2004 | 0.1 | 0.4 | 1.1 | 0 | 0 | 0.4 |
| Butte Camp | A 04 | 2005 | 0.4 | 1.3 | 1.2 | 0 | 0 | 1.3 |
| Butte Camp | A 04 | 2008 | 0.1 | 0.5 | 0.8 | 0.1 | 0 | 3.1 |
| Butte Camp | A 04 | 2009 | 0.5 | 0.3 | 0.8 | 0.1 | 0 | 3.9 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Butte Camp | C 01 | 1980 | 0 | 0 | 0.1 | 0 | 0 | 8.7 |
| Butte Camp | C 01 | 1981 | 0 | 0.1 | 4 | 0 | 0 | 1.9 |
| Butte Camp | C 01 | 1982 | 0 | 0.4 | 4.3 | 0 | 0 | 0.8 |
| Butte Camp | C 01 | 1983 | 0 | 0.3 | 4.1 | 0 | 0 | 0.1 |
| Butte Camp | C 01 | 1984 | 0 | 0.1 | 4.5 | 0 | 0 | 0.2 |
| Butte Camp | C 01 | 1985 | 0 | 0.1 | 3.3 | 0 | 0 | 0.1 |
| Butte Camp | C 01 | 1986 | 0 | 0.1 | 2.5 | 0 | 0 | 0.1 |
| Butte Camp | C 01 | 1987 | 0 | 0.4 | 3.8 | 0 | 0 | 0.1 |
| Butte Camp | C 01 | 1988 | 0 | 0.2 | 4.3 | 0 | 0 | 0.3 |
| Butte Camp | C 01 | 1989 | 0 | 0.1 | 3.5 | 0 | 0 | 0.5 |
| Butte Camp | C 01 | 1990 | 0 | 0.1 | 5.5 | 0 | 0 | 1 |
| Butte Camp | C 01 | 1991 | 0 | 0.1 | 4 | 0 | 0 | 1.4 |
| Butte Camp | C 01 | 1992 | 0 | 0.2 | 4.1 | 0 | 0 | 1.3 |
| Butte Camp | C 01 | 1994 | 0 | 0.1 | 5 | 0 | 0 | 0.6 |
| Butte Camp | C 01 | 1995 | 0 | 0.1 | 3.5 | 0 | 0 | 0.2 |
| Butte Camp | C 01 | 1996 | 0 | 0.1 | 7.3 | 0 | 0 | 0.1 |
| Butte Camp | C 01 | 1997 | 0 | 0.1 | 3.1 | 0 | 0 | 0.3 |
| Butte Camp | C 01 | 1998 | 0 | 0.1 | 3.1 | 0 | 0 | 0.5 |
| Butte Camp | C 01 | 1999 | 0 | 0.1 | 3.4 | 0 | 0 | 0.3 |
| Butte Camp | C 01 | 2000 | 0 | 0.1 | 5.6 | 0 | 0 | 1.3 |
| Butte Camp | C 01 | 2002 | 0 | 0.1 | 3.5 | 0 | 0 | 0.4 |
| Butte Camp | C 01 | 2003 | 0 | 0.1 | 3.3 | 0 | 0 | 0.1 |
| Butte Camp | C 01 | 2004 | 0 | 0.1 | 2.5 | 0 | 0 | 0.3 |
| Butte Camp | C 01 | 2005 | 0 | 0.1 | 3.1 | 0 | 0 | 0.4 |
| Butte Camp | C 01 | 2007 | 0 | 0.1 | 2.3 | 0 | 0 | 1.3 |
| Butte Camp | C 01 | 2008 | 0 | 0.1 | 3.3 | 0 | 0 | 1 |
| Butte Camp | C 01 | 2009 | 0 | 0.1 | 2.8 | 0 | 0 | 1.4 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Lahar | 4 | 1982 | 0.1 | 0 | 0 | 0 | 0 | 0.1 |
| Lahar | 4 | 1983 | 0.1 | 0 | 0 | 0 | 0 | 0.1 |
| Lahar | 4 | 1984 | 0.1 | 0 | 0 | 0 | 0 | 0.1 |
| Lahar | 4 | 1985 | 0.1 | 0 | 0.1 | 0 | 0 | 0.1 |
| Lahar | 4 | 1986 | 0.1 | 0 | 0.1 | 0.1 | 0 | 0.1 |
| Lahar | 4 | 1987 | 0.1 | 0 | 0.1 | 0.1 | 0.1 | 0.1 |
| Lahar | 4 | 1988 | 0.1 | 0.1 | 0.3 | 0.1 | 0.1 | 0.1 |
| Lahar | 4 | 1989 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 |
| Lahar | 4 | 1990 | 0.1 | 0.1 | 0.1 | 0.1 | 0.1 | 0.3 |
| Lahar | 4 | 1991 | 0.4 | 0.1 | 0.5 | 0.1 | 0.1 | 1.1 |
| Lahar | 4 | 1992 | 0.3 | 0.1 | 0.8 | 0.1 | 0.1 | 0.4 |
| Lahar | 4 | 1993 | 0.5 | 0.1 | 1.5 | 0.1 | 0.1 | 1 |
| Lahar | 4 | 1994 | 0.6 | 0.1 | 1.3 | 0.1 | 0.1 | 0.1 |
| Lahar | 4 | 1995 | 0.7 | 0.1 | 1.4 | 0.1 | 0.1 | 0.6 |
| Lahar | 4 | 1996 | 1 | 0.1 | 1.5 | 0.1 | 0.1 | 0.5 |
| Lahar | 4 | 1997 | 1.5 | 0.1 | 1.7 | 0.1 | 0.1 | 0.7 |
| Lahar | 4 | 1998 | 2.8 | 0.1 | 2.6 | 0.1 | 0.1 | 1.7 |
| Lahar | 4 | 1999 | 3.8 | 0.1 | 2.1 | 0.1 | 0.2 | 1.3 |
| Lahar | 4 | 2000 | 4.2 | 0 | 3.4 | 0.1 | 0.5 | 5.3 |
| Lahar | 4 | 2002 | 4.1 | 0 | 2.5 | 0.1 | 0.5 | 5.6 |
| Lahar | 4 | 2003 | 3.7 | 0 | 1.7 | 0.1 | 0.1 | 12.3 |
| Lahar | 4 | 2004 | 1.8 | 0.1 | 2.6 | 0.1 | 0.2 | 11.9 |
| Lahar | 4 | 2005 | 4.2 | 0.1 | 3.1 | 0.1 | 0.4 | 8.8 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Pine Creek | A 04 | 1981 | 0 | 0.1 | 0.1 | 0 | 1.6 | 0 |
| Pine Creek | A 04 | 1982 | 0 | 0.1 | 0.1 | 0.1 | 5.3 | 0.6 |
| Pine Creek | A 04 | 1983 | 0 | 0 | 0.1 | 0 | 8.2 | 3.1 |
| Pine Creek | A 04 | 1984 | 0 | 0 | 1.3 | 0 | 8.6 | 1 |
| Pine Creek | A 04 | 1985 | 0 | 0 | 0.1 | 0 | 8.9 | 2.4 |
| Pine Creek | A 04 | 1986 | 0 | 0 | 0.1 | 0 | 10.3 | 5.9 |
| Pine Creek | A 04 | 1987 | 0 | 0 | 0.1 | 0 | 8.6 | 3.1 |
| Pine Creek | A 04 | 1988 | 0 | 0 | 0.1 | 0 | 10.2 | 2.8 |
| Pine Creek | A 04 | 1989 | 0 | 0.1 | 0.1 | 0 | 10.5 | 7.1 |
| Pine Creek | A 04 | 1990 | 0 | 0 | 0.1 | 0 | 11.4 | 8.8 |
| Pine Creek | A 04 | 1991 | 0 | 0 | 0.1 | 0 | 11.2 | 6.9 |
| Pine Creek | A 04 | 1992 | 0 | 0 | 0.1 | 0 | 12.8 | 3.5 |
| Pine Creek | A 04 | 1994 | 0 | 0 | 0.1 | 0 | 14 | 4.9 |
| Pine Creek | A 04 | 1995 | 0 | 0 | 0.1 | 0.1 | 13.2 | 5 |
| Pine Creek | A 04 | 1996 | 0 | 0 | 0.2 | 0 | 13.2 | 4 |
| Pine Creek | A 04 | 1997 | 0 | 0 | 0.3 | 0.1 | 8.6 | 3.6 |
| Pine Creek | A 04 | 1999 | 0 | 0 | 0.3 | 0.1 | 11.3 | 5.3 |
| Pine Creek | A 04 | 2000 | 0.1 | 0 | 0.2 | 0.1 | 9.5 | 4.6 |
| Pine Creek | A 04 | 2002 | 0 | 0 | 0.2 | 0.1 | 12.2 | 3.2 |
| Pine Creek | A 04 | 2003 | 0.1 | 0 | 0.3 | 0.1 | 6.9 | 3 |
| Pine Creek | A 04 | 2005 | 0.1 | 0 | 0.3 | 0.1 | 7.6 | 2.9 |
| Pine Creek | A 04 | 2006 | 0.1 | 0 | 0.4 | 0.1 | 8.3 | 1.3 |
| Pine Creek | A 04 | 2007 | 0.1 | 0 | 0.3 | 0.1 | 9.1 | 1.9 |
| Pine Creek | A 04 | 2008 | 0.1 | 0 | 0.4 | 0.1 | 9 | 2.2 |
| Pine Creek | A 04 | 2009 | 0.1 | 0 | 0.5 | 0.1 | 9.1 | 1.4 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Pine Creek | B 02 | 1980 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | B 02 | 1981 | 0 | 0 | 0.1 | 0 | 0 | 0 |
| Pine Creek | B 02 | 1982 | 0 | 0.1 | 0.1 | 0 | 0.1 | 0.1 |
| Pine Creek | B 02 | 1983 | 0 | 0 | 0.1 | 0 | 0.1 | 0.1 |
| Pine Creek | B 02 | 1984 | 0 | 0 | 0.1 | 0 | 0.1 | 0.1 |
| Pine Creek | B 02 | 1985 | 0 | 0 | 0.1 | 0 | 0.1 | 0.9 |
| Pine Creek | B 02 | 1986 | 0 | 0 | 0.1 | 0 | 0.1 | 0.9 |
| Pine Creek | B 02 | 1987 | 0 | 0 | 0.1 | 0 | 0.1 | 0.1 |
| Pine Creek | B 02 | 1988 | 0 | 0.1 | 0.1 | 0 | 0.1 | 0.1 |
| Pine Creek | B 02 | 1989 | 0 | 0.1 | 0.3 | 0 | 0.5 | 0.1 |
| Pine Creek | B 02 | 1990 | 0 | 0.1 | 0.3 | 0 | 1 | 0.1 |
| Pine Creek | B 02 | 1991 | 0 | 0.1 | 0.3 | 0 | 1.5 | 0.3 |
| Pine Creek | B 02 | 1992 | 0 | 0.1 | 0.4 | 0 | 1.1 | 0.1 |
| Pine Creek | B 02 | 1994 | 0 | 0.1 | 0.6 | 0 | 2.4 | 0.1 |
| Pine Creek | B 02 | 1995 | 0 | 0.1 | 0.4 | 0 | 2.8 | 0.1 |
| Pine Creek | B 02 | 1996 | 0 | 0 | 0.5 | 0 | 3.3 | 0.2 |
| Pine Creek | B 02 | 1997 | 0 | 0 | 0.7 | 0 | 2.2 | 0.3 |
| Pine Creek | B 02 | 1999 | 0 | 0.1 | 3.6 | 0 | 5 | 2.8 |
| Pine Creek | B 02 | 2000 | 0 | 0.1 | 0.6 | 0.1 | 2 | 6.7 |
| Pine Creek | B 02 | 2002 | 0 | 0 | 0.5 | 0.1 | 3.4 | 6.1 |
| Pine Creek | B 02 | 2003 | 0 | 0 | 0.4 | 0.1 | 2.8 | 4.5 |
| Pine Creek | B 02 | 2005 | 0 | 0 | 0.3 | 0.1 | 1.7 | 8.5 |
| Pine Creek | B 02 | 2006 | 0 | 0 | 0.8 | 0.1 | 3 | 7.8 |
| Pine Creek | B 02 | 2007 | 0 | 0 | 1 | 0.1 | 3.6 | 10 |
| Pine Creek | B 02 | 2008 | 0 | 0 | 0.5 | 0.1 | 3.1 | 14.6 |
| Pine Creek | B 02 | 2009 | 0 | 0 | 0.7 | 0.1 | 2.5 | 22.7 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Pine Creek | E 03 | 1980 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | E 03 | 1981 | 0 | 0.1 | 0.1 | 0 | 0.1 | 0.1 |
| Pine Creek | E 03 | 1982 | 0 | 0.1 | 1 | 0 | 0.1 | 0.1 |
| Pine Creek | E 03 | 1983 | 0 | 0.1 | 1.8 | 0 | 0.1 | 0.6 |
| Pine Creek | E 03 | 1984 | 0 | 0.1 | 3 | 0 | 0.1 | 0.8 |
| Pine Creek | E 03 | 1985 | 0 | 0.1 | 1.8 | 0 | 0.2 | 0.4 |
| Pine Creek | E 03 | 1986 | 0 | 0.2 | 2 | 0 | 0.5 | 0.2 |
| Pine Creek | E 03 | 1987 | 0 | 0.1 | 3 | 0 | 1 | 0.3 |
| Pine Creek | E 03 | 1988 | 0 | 0.2 | 2.8 | 0 | 1.8 | 0.1 |
| Pine Creek | E 03 | 1989 | 0 | 0.1 | 2.2 | 0 | 3.4 | 2 |
| Pine Creek | E 03 | 1990 | 0 | 0.2 | 2.3 | 0 | 5.1 | 2.3 |
| Pine Creek | E 03 | 1991 | 0 | 0.1 | 2.2 | 0 | 7.7 | 3 |
| Pine Creek | E 03 | 1992 | 0 | 0.1 | 2.6 | 0 | 9.2 | 1.5 |
| Pine Creek | E 03 | 1994 | 0 | 0.3 | 2.9 | 0 | 11.6 | 1.8 |
| Pine Creek | E 03 | 1995 | 0 | 0.1 | 2.6 | 0 | 18.3 | 1.2 |
| Pine Creek | E 03 | 1996 | 0 | 0.1 | 3 | 0 | 20.2 | 2.5 |
| Pine Creek | E 03 | 1997 | 0 | 0.1 | 2.6 | 0 | 15.8 | 0.8 |
| Pine Creek | E 03 | 2000 | 0 | 0.1 | 2.5 | 0 | 36.5 | 2.4 |
| Pine Creek | E 03 | 2002 | 0 | 0 | 2.6 | 0 | 26.5 | 4 |
| Pine Creek | E 03 | 2003 | 0 | 0.1 | 2.6 | 0 | 22.6 | 2.5 |
| Pine Creek | E 03 | 2005 | 0 | 0.1 | 3.3 | 0 | 17.7 | 3.5 |
| Pine Creek | E 03 | 2006 | 0 | 0.2 | 3.9 | 0.1 | 17.5 | 2.5 |
| Pine Creek | E 03 | 2007 | 0 | 0 | 5 | 0.1 | 18.6 | 2.9 |
| Pine Creek | E 03 | 2008 | 0 | 0 | 3 | 0.1 | 18.8 | 0.4 |
| Pine Creek | E 03 | 2009 | 0 | 0.1 | 2.8 | 0 | 16.9 | 1.5 |

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Pine Creek | E 03 | 1980 | 0 | 0 | 0 | 0 | 0.1 | 0 |
| Pine Creek | E 03 | 1981 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | E 03 | 1982 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | E 03 | 1983 | 0 | 0 | 0 | 0.1 | 0 | 0 |
| Pine Creek | E 03 | 1984 | 0 | 0 | 0 | 0.1 | 0 | 0 |
| Pine Creek | E 03 | 1985 | 0 | 0 | 0 | 0.1 | 0 | 0 |
| Pine Creek | E 03 | 1986 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | E 03 | 1987 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | E 03 | 1988 | 0 | 0 | 0 | 0 | 0 | 0 |
| Pine Creek | E 03 | 1989 | 0 | 0 | 0 | 0 | 0.1 | 0 |
| Pine Creek | E 03 | 1990 | 0 | 0 | 0 | 0 | 0.1 | 0 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Pumice Plain | 6 | 1990 | 0 | 0 | 0 | 0.1 | 0 | 0 |
| Pumice Plain | 6 | 1991 | 0 | 0 | 0 | 0.1 | 0 | 0 |
| Pumice Plain | 6 | 1992 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 1993 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 1994 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 1995 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 1996 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 1997 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 1998 | 0 | 0 | 0 | 0.1 | 0.1 | 0.5 |
| Pumice Plain | 6 | 1999 | 0 | 0 | 0 | 0.1 | 0.1 | 0.4 |
| Pumice Plain | 6 | 2000 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Pumice Plain | 6 | 2001 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Pumice Plain | 6 | 2002 | 0 | 0 | 0 | 0.1 | 0.1 | 1.2 |
| Pumice Plain | 6 | 2003 | 0 | 0 | 0 | 0.1 | 0.1 | 1.4 |
| Pumice Plain | 6 | 2004 | 0 | 0 | 0 | 0.4 | 0.1 | 5.5 |
| Pumice Plain | 6 | 2005 | 0 | 0 | 0 | 0.2 | 0.1 | 0 |
| Pumice Plain | 6 | 2006 | 0.1 | 0 | 0 | 0.2 | 0.1 | 0 |
| Pumice Plain | 6 | 2007 | 0.1 | 0 | 0 | 0.3 | 0.2 | 0.1 |
| Pumice Plain | 6 | 2008 | 0 | 0 | 0 | 0.2 | 0.2 | 0.1 |
| Pumice Plain | 6 | 2009 | 0 | 0 | 0 | 0.2 | 0.3 | 0.1 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Studebaker Ridge | 8 | 1984 | 0 | 0 | 0 | 0 | 0 | 0 |
| Studebaker Ridge | 8 | 1985 | 0 | 0 | 0 | 0 | 0 | 0 |
| Studebaker Ridge | 8 | 1986 | 0 | 0 | 0 | 0 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1988 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1989 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1990 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1991 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1992 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1993 | 0 | 0 | 0 | 0.5 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1994 | 0.1 | 0 | 0 | 0.2 | 0 | 0.1 |
| Studebaker Ridge | 8 | 1995 | 0 | 0 | 0 | 0.2 | 0.1 | 0.1 |
| Studebaker Ridge | 8 | 1997 | 0 | 0 | 0 | 0.1 | 0 | 0.4 |
| Studebaker Ridge | 8 | 1998 | 0 | 0 | 0 | 0.2 | 0.1 | 0.8 |
| Studebaker Ridge | 8 | 1999 | 0 | 0 | 0 | 0.1 | 0.1 | 1.5 |
| Studebaker Ridge | 8 | 2000 | 0 | 0 | 0 | 0.1 | 0 | 0.5 |
| Studebaker Ridge | 8 | 2001 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 8 | 2002 | 0 | 0 | 0 | 0.1 | 0 | 0.5 |
| Studebaker Ridge | 8 | 2003 | 0 | 0 | 0 | 0.1 | 0.1 | 1.1 |
| Studebaker Ridge | 8 | 2004 | 0 | 0 | 0 | 0.1 | 0.1 | 8.9 |
| Studebaker Ridge | 8 | 2005 | 0 | 0 | 0 | 0.1 | 0.1 | 0.9 |
| Studebaker Ridge | 8 | 2006 | 0 | 0 | 0w | 0.1 | 0.1 | 1 |
| Studebaker Ridge | 8 | 2008 | 0 | 0 | 0 | 0.1 | 0.1 | 0.9 |
| Studebaker Ridge | 8 | 2009 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral*, *Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Studebaker Ridge | 13 | 1989 | 0 | 0 | 0 | 0.1 | 0 | 0.2 |
| Studebaker Ridge | 13 | 1990 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Studebaker Ridge | 13 | 1991 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Studebaker Ridge | 13 | 1992 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Studebaker Ridge | 13 | 1993 | 0 | 0 | 0 | 0.1 | 0.1 | 0.1 |
| Studebaker Ridge | 13 | 1994 | 0 | 0 | 0 | 0.1 | 0.1 | 0.2 |
| Studebaker Ridge | 13 | 1995 | 0 | 0 | 0 | 0.1 | 0.1 | 0.2 |
| Studebaker Ridge | 13 | 1997 | 0 | 0 | 0 | 0.1 | 0.1 | 0.5 |
| Studebaker Ridge | 13 | 1999 | 0 | 0 | 0 | 0.2 | 0.1 | 0.6 |
| Studebaker Ridge | 13 | 2000 | 0 | 0 | 0 | 0.1 | 0.1 | 0.3 |
| Studebaker Ridge | 13 | 2001 | 0 | 0 | 0 | 0.1 | 0.1 | 0.7 |
| Studebaker Ridge | 13 | 2002 | 0 | 0 | 0 | 0.1 | 0.1 | 2 |
| Studebaker Ridge | 13 | 2003 | 0 | 0 | 0 | 0.1 | 0.1 | 0.7 |
| Studebaker Ridge | 13 | 2004 | 0 | 0 | 0 | 0.1 | 0.1 | 2.6 |
| Studebaker Ridge | 13 | 2005 | 0 | 0 | 0 | 0.1 | 0.1 | 0.3 |
| Studebaker Ridge | 13 | 2006 | 0 | 0 | 0 | 0.2 | 0.1 | 0.1 |
| Studebaker Ridge | 13 | 2007 | 0 | 0 | 0 | 0.2 | 0.1 | 0.1 |
| Studebaker Ridge | 13 | 2008 | 0 | 0 | 0 | 0.3 | 0.1 | 0.3 |
| Studebaker Ridge | 13 | 2009 | 0 | 0 | 0 | 0.4 | 0.1 | 0.2 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Toutle Ridge | 1 | 1981 | 0 | 0 | 0 | 0 | 0 | 0 |
| Toutle Ridge | 1 | 1982 | 0 | 0 | 0 | 0 | 0 | 0.1 |
| Toutle Ridge | 1 | 1983 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Toutle Ridge | 1 | 1984 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Toutle Ridge | 1 | 1986 | 0 | 0.1 | 0 | 0.1 | 0 | 0.1 |
| Toutle Ridge | 1 | 1987 | 0 | 0 | 0 | 0.1 | 0 | 0.1 |
| Toutle Ridge | 1 | 1994 | 0 | 0.5 | 0 | 0.1 | 0 | 1.8 |
| Toutle Ridge | 1 | 1996 | 0 | 0.4 | 0 | 0.3 | 0 | 4.3 |
| Toutle Ridge | 1 | 1997 | 0 | 0.4 | 0 | 0.2 | 0 | 5 |

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Toutle Ridge | 4 | 1981 | 0 | 0 | 0 | 0 | 0 | 0.2 |
| Toutle Ridge | 4 | 1982 | 0 | 0 | 0 | 0.1 | 0 | 3.2 |
| Toutle Ridge | 4 | 1983 | 0 | 0.1 | 0 | 0 | 0 | 2.3 |
| Toutle Ridge | 4 | 1984 | 0 | 0.1 | 0 | 0 | 0 | 0.6 |
| Toutle Ridge | 4 | 1986 | 0 | 0.1 | 0.1 | 0 | 0 | 2.7 |
| Toutle Ridge | 4 | 1987 | 0 | 0.1 | 0.1 | 0 | 0 | 8.6 |
| Toutle Ridge | 4 | 1994 | 0 | 0.1 | 1.2 | 0 | 0 | 2.3 |
| Toutle Ridge | 4 | 1996 | 0 | 0.1 | 0.1 | 0 | 0 | 0.9 |
| Toutle Ridge | 4 | 1997 | 0 | 0 | 0.1 | 0 | 0 | 1.1 |

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# Mount St. Helens Eruption and Succession Data

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**Mount St. Helens Succession Data Table (continued)**

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Toutle Ridge | 6 | 1981 | 0 | 0 | 0.1 | 0 | 0 | 0.1 |
| Toutle Ridge | 6 | 1982 | 0 | 0.1 | 0.8 | 0 | 0 | 4.6 |
| Toutle Ridge | 6 | 1983 | 0 | 0.1 | 0.7 | 0 | 0 | 0.1 |
| Toutle Ridge | 6 | 1984 | 0 | 0.1 | 0.9 | 0 | 0 | 0.4 |
| Toutle Ridge | 6 | 1986 | 0 | 0.1 | 1.3 | 0 | 0 | 4.2 |
| Toutle Ridge | 6 | 1987 | 0 | 0.1 | 0.3 | 0 | 0 | 14.1 |
| Toutle Ridge | 6 | 1994 | 0 | 0.2 | 1.9 | 0 | 0 | 4.6 |
| Toutle Ridge | 6 | 1996 | 0 | 0.1 | 5.7 | 0 | 0 | 2.5 |
| Toutle Ridge | 6 | 1997 | 0 | 0.2 | 2.3 | 0 | 0 | 3.5 |

| Plot Name | Plot Number | Year | % cover Subalpine fir *Seral, Climax* | % cover Western needlegrass *Pioneer* | % cover Shasta buckwheat *Pioneer, Seral* | % cover White hawkweed *Pioneer* | % cover Partridge foot *Pioneer, Seral* | % cover Pacific lupine *Pioneer, Seral (Nitrogen fixing)* |
|---|---|---|---|---|---|---|---|---|
| Toutle Ridge | 10 | 1981 | 0 | 0 | 0 | 0 | 0 | 1.3 |
| Toutle Ridge | 10 | 1982 | 0 | 0 | 0.1 | 0 | 0 | 1.8 |
| Toutle Ridge | 10 | 1983 | 0 | 0.1 | 0.1 | 0 | 0 | 0.5 |
| Toutle Ridge | 10 | 1984 | 0 | 0.1 | 0.1 | 0 | 0 | 0.8 |
| Toutle Ridge | 10 | 1986 | 0 | 0 | 0.1 | 0 | 0 | 2.1 |
| Toutle Ridge | 10 | 1987 | 0 | 0 | 0.1 | 0 | 0 | 9.3 |
| Toutle Ridge | 10 | 1994 | 0 | 0 | 2.2 | 0 | 0 | 4.5 |
| Toutle Ridge | 10 | 1997 | 0 | 0 | 0.1 | 0 | 0 | 2.3 |
| Toutle Ridge | 4 | 1997 | 0 | 0 | 0.1 | 0 | 0 | 1.1 |

Data extracted from original tables at Ecological Archives E091-152-D1.

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