The Weekly Plant 2 June 2013

Common names: purple threeawn (or three-awn)

Scientific name: Aristida purpurea¹

TAV location:

Widespread. There are many plants along the curb in front of lots 49-60.

Discussion:

A visitor to our yard recently admired some grasses placed quite ornamentally near a patio pillar. Though we'd like to take credit, these grasses, two quite lovely purple threeawns, arrived and thrived on their own, with no help from us.

Purple threeawn is a highly variable grass found throughout the western half of the US. Even within the Village, the leaves of some plants stay low, with the flower stalks high overhead, while the leaves of others plants grow almost as high as the flowers, making you wonder if it's really two different species.

Purple threeawn is a bunch grass, 1-3' high. Each plant expands only slowly and stays in a clump (compare this to lawn grasses that spread over the ground quite rapidly). Though each plant stays small, purple threeawn reseeds readily and can

pop up in many places. It is considered an early succession plant, meaning it does well in disturbed areas such as those that have been overgrazed or cleared for building. These are valuable plants for they quickly cover the soil, holding it against erosion.

Grass flowers are wind pollinated. Because of this, the plant wastes no energy on showy petals. Instead the sexual parts of the flower are surrounded by dry bracts that also surround, and may eventually adhere to, the seed. It is these bracts that give purple threeawn both halves of its common name.

Purple: when the grass is flowering and the seed is just developing, the bracts have a purplish color. If you remember a purple grass from April and early May, it was this grass. "With a gentle breeze passing through purple three-awn…, a dreamer can imagine that the earth has purple hair."

Threeawn: the bract surrounding the seed has three thin, long appendages, called awns, at the distal end. When the seed is mature, these awns change from purple to tan. They spread out horizontally to the seed, like spokes of a wheel. As all the seeds mature, the flower stalks look like "tangles of very long-legged, delicate spiders". The awns help disperse the seed, easily snagging on a passing animal or sock.

Purple threeawn is a great occasional addition to a landscape (who can resist purple hair and long-legged spiders!). It would be great on a slope that is prone to erosion.





Left: A single mature seed. The three awns have spread out and are tan. Right: "tangles of very long-legged, delicate spiders" - the flower stalk with maturing seeds.







Top: purple coloration of immature bracts and seeds. (photo from Yavapai County Cooperative Extension: http://prescottnatives.com/index.php) Bottom: a single developing seed. Note that the awns are still purple and have not yet spread.

¹ Tropicos is the source of the currently accepted scientific name: http://www.tropicos.org/.

² From LBJ Wildflower Center: http://www.wildflower.org/plants/result.php?id_plant=ARPU9

³ This from the Minnesota Department of Natural Resources! http://www.dnr.state.mn.us/rsg/profile.html? action=elementDetail&selectedElement=PMPOA0K0W1