What are cover crops?

Cover crops are plants that increase the health and fertility of soil. They ultimately prevent soil erosion and nutrient loss as well as disease, pest, and weed pressure. Cover crops can increase biodiversity, and also promote water conservation.

01 Warm season

Warm season

Grows rapidly

Suppressed weeds

Buckwheat

Good for a short growing window, and mainly used to out-compete weeds. Buckwheat also increases phosphorus availability and attracts beneficial pollinators. Kill within a week after flowering if you want to prevent re-seeding.

02 Winter hardy

Winter hardy

Great planted in a mix

Prevents erosion

Cereal rye

Winter hardy and can be planted very late. This is great for preventing erosion and increasing the amount of organic matter in soil. Cereal rye can immobilize nitrogen, so plant it in a mix with something else that gives nitrogen!
**COWPEAS**

Cowpeas are a great addition of nitrogen during the summer growing season. They are a legume and have a very long taproot system.

**CRIMSON CLOVER**

Plant crimson clover in the fall and let it grow into the spring. It adds nitrogen to the soil and is used for erosion control and forage if you have livestock.

**DAIKON RADISH**

Also known as tillage radish, daikons have a long taproot that can break through hard, compact soil. This can increase water infiltration and create air space. Daikon radish will store nitrogen and other nutrients that would normally be leached throughout the winter, making them available for the next growing season.
**Hairy Vetch**

Vetch will grow slowly in the fall, going dormant in the winter. It will then grow vigorously in the spring. Vetch can fix 160+ lbs. of nitrogen & will also create biomass! Mixing it with a crop like rye will encourage its growth upward, and can make it more productive.

- Winter hardy
- Great planted in a mix
- Fixes nitrogen

**Millet**

Pearl millet is an annual warm season grass. It is usually used to increase organic matter in soil and is a great candidate for blending with other warm season crops. Millet will winter kill.

- Heat/drought tolerant
- Increases organic matter
- Grows rapidly

**Oats**

Use oats in early spring or in fall as a winter kill crop. Oats are an annual grass. Oats can improve soil tilth, prevent erosion, and also increase the amount of organic matter in soil.

- Spring or fall
- Prevents erosion
- Improves soil tilth
SPRING & WINTER PEA

Spring peas will winter kill. They need 60 days of growth prior to frosts in order to fix nitrogen most efficiently. Mixing with oats and radishes will aid in biomass production & biological tillage. Winter peas will overwinter, but have the same basic functions as spring peas.

fixes nitrogen

09

good for planting in mix

SORGHUM SUDAN

This is an annual warm season grass that is best mixed. It adds a significant amount of biomass to the soil and organic matter. If mowed or grazed when 3-4 ft. tall, sorghum sudan puts a lot of energy into root growth, reducing soil compaction. These roots also pull nutrients from the subsoil into the upper soil layers, making them available for use.

grows rapidly

10

heat & drought tolerant

decreases soil compaction

Sources:
http://greenacrescovercrops.com