

Chickweeds and Cockles in North Dakota

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CHICKWEEDS, Catchflies and Cockles comprise a considerable group of weedy plants belonging to the same family as the carnation, baby's breath, a few other ornamentals and numerous weedy little plants. The flowers usually have five petals but these are often cleft or divided to give the appearance of ten. Many seeds are produced in capsules opening at the top. There are no divisions in the capsule so that the ripe seeds may rattle around freely. The seeds are usually wedge-shaped, curved or rounded, covered with rows of protuberances, which are one of the outstanding characters of the group.

Corn cockle (*Agrostemma githago*), also known as rough cockle and purple cockle, is one of the best known species. The word "corn" means simply "grain." It was used in England and the similar word "korn" in Germany, long before our Indian corn or maize was known to European peoples. It is called klinte in Norway. Corn cockle has purple flowers about three-fourths of an inch wide. The plants are tall and "stemmy" with narrow, hairy leaves. It is a rare plant in most of North Dakota and apparently has not become more common. The black wedge-shaped, rough seeds are well known because they are conspicuous in the threshed grain. They contain saponin, a somewhat poisonous material and so are especially objectionable.

pink, hardly one-half inches wide. Often the plant is grown in flower beds. The seeds are almost perfectly round, a little larger than mustard seeds, and the rows of protuberances so faint as to give the surface a finely stippled appearance.

White cockle (*Lychnis alba*) is more nearly related to the catchflies. It is rare in North Dakota, though we have noted it as quite common in the Turtle Mountains and through northern Minnesota. The commonest of all the catchflies is called night-flowering catchfly (*Silene noctiflora*), though this really does not distinguish it from others. The flowers of most of them open in the evening and are then white, becoming yellowish or

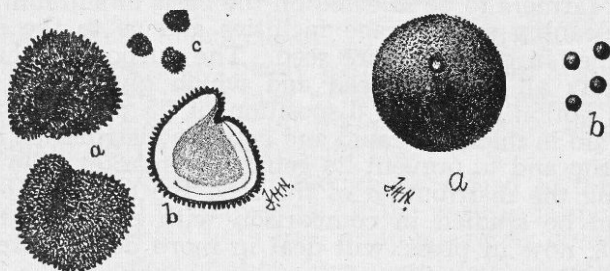


Figure 1. Seeds of Corn Cockle and Pink Cockle.

Pink cockle (*Saponaria vaccaria*) also known as cowherb and cow cockle, is quite a different looking plant and is quite common, especially in the drier soils. It makes a bushy plant, 1 to 2 feet high. The leaves are broad, very smooth and waxy. The flowers are numerous,

pinkish as they fade the next morning.

Night-flowering catchfly is a common weed in fields. The plants are widely branched and may reach a height of 2 feet or more. The oblong leaves, stems and sepals are

thickly covered with short, sticky hairs. The seeds are gray about the size of red clover seeds in which they are a common impurity. Several other species of catchfly occur here. One of the more recently introduced ones we have called smooth catchfly (*Silene fabaria*), because the leaves are waxy, very much like those of pink cockle. It is frequently seen along railroad tracks and abundantly along gravelled highways or in old gravel pits. It seems to grow in such places rather than in fields.

ered with a sticky material to which seeds or other small objects become attached. We have been told of small chickens becoming caught by these sticky stems. They have been supposed to prevent ants or other insects from crawling up the stems to the flowers.

Two chickweeds are especially common. On the prairie in May, prairie chickweed (*Cerastium arvense*) forms conspicuous white patches. The stems creep along the ground and flowering branches rise

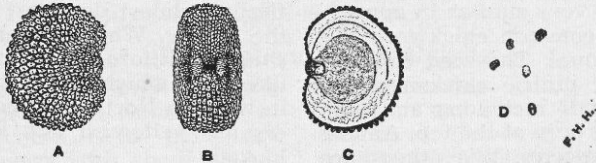


Figure 2. Seeds of Corn Cockle, Pink Cockle and Catchfly.

The origin of the name catchfly is best illustrated by an insignificant native plant, called sleepy catchfly (*Silene antirrhina*), because the white petals of the flowers are so small that they are hidden by the sepals. It is a slender, erect plant about 2 feet high and may be found in prairie fields or along roads. Portions of the stem, about three-fourths of an inch long between the pairs of leaves, are cov-

ered with a profusion of white flowers about one-half inch wide. This is a native plant, hardly to be called a weed, except that it occupies ground where grass might grow.

Common chickweed (*Stellaria media*) is one of our most troublesome lawn weeds. It is only an annual in our region, but it grows rapidly and matures quickly. The little white

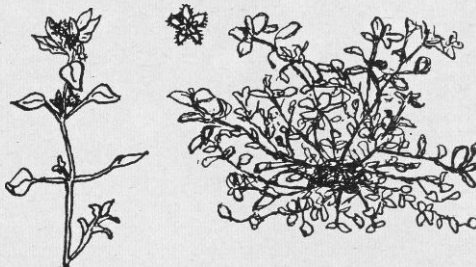


Figure 3. Chickweed. A small creeping annual, but a troublesome lawn weed.

flowers produce rounded capsules which split down the sides to release a number of tiny red seeds. The plant grows quite well in shaded places where grass does not thrive, but it also extends out into the open. Frequently it is found in wooded places away from dwellings or behind farm buildings. No simple way of controlling this weed has been found. Some of it may be removed with a rake. It will be crowded out by a thick growth of grass, so fertilizers and good care of lawns seem the best remedy.

Mouse-ear chickweed (*Cerastium arvense*) has been rare in North Dakota. It is very similar in appearance to the common chickweed but it is a perennial. The seed capsules of it and of prairie chickweed are nearly one-half inch long and narrow, opening only at the top. Among our native species, two others are

quite common. Blunt-leaved chickweed (*Arenaria lateriflora*) is common in rather dry woods, brushy or open places and its white flowers with rounded petals are quite showy. Long-leaved chickweed (*Stellaria longifolia*), makes a slender, tangled growth in shaded places. Sandwort, stichwort and pearlwort are names applied to other small species which are numerous in cold regions.

Two rather odd forms which we have may be mentioned. Around the edges of alkali ponds in late summer, one often sees a low growth of bright red plants. These are sand spurry (*Suaeda rubra*), a fleshy, almost leafless member of the family. Whitlow-wort (*Paronychia sessiliflora*) is a tufted, moss-like plant which grows on rocky hills in western North Dakota. The flowers are yellowish and easily overlooked.



Figure 4. Prairie Chickweed. A common native perennial.