

Crop Formation: Gravity, Iowa 1996

Laboratory Code: KS-03-104

Location: Gravity-Bedford, Iowa

Material: Grass and Soil **Formed:** Between May 17-30, 1996

Sampled: 6-25-96 and 11-1-96

Sampled By: Beverly Trout

Formation Characteristics: Two very unusual soil formations consisting of two, bare ground, circular regions each exactly 11 ft. 7 in. and separated by 9 ft. 4 in. The outer edges of the circles were depressed, while the centers were not.

Relevant Findings:

- 1) - redox tests disclosed no mitochondria activity in the grass.
- 2) - no significant amounts of magnetic drag material from soil samples.

Results and Discussion:

Grass samples taken near and from the center of the circular formations were examined for redox activity. It was surprising to find the absence of respiration or mitochondria activity. It was later learned, however, that the farmer had sprayed weed killer over the field about 72 hrs. before the samples were collected; this suppressed plant respiration.

A total of 26 soil samples (each from 150-250 gms.) taken within and outside the circle formations were examined for magnetic material. A few samples had a "trace" of material, but the levels were far below those found in normal soil (0.4 mg/g soil).

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