

Give Us Park Rangers To Match Our Grasshoppers

By Mark Wagner

WHEN your visitors from afar are too frightened to
get out of their car, who do you call?

GRASSHOPPER BUSTERS!

WHEN the farmer down the block needs some
help to save his crop, who do you call?

GRASSHOPPER BUSTERS!

WHEN you can't get to the door 'cause they're
coverin' the whole floor, who do you call?

GRASSHOPPER BUSTERS!

WHEN the railroad tracks are slick from the grass-
hopper grease that's thick, who do you call?

GRASSHOPPER BUSTERS!

"Promontory, May 1869. The town consisted of a few tents, the ticket houses of both companies, their telegraph offices, hordes of grasshoppers, and swarms of sand fleas." So goes the description of Promontory 116 years ago. Today, the town is gone, but the grasshoppers are back for another visit.

The situation at Promontory this past Spring was getting out of hand. Grasshoppers were covering everything. The walkway to the visitor center was (literally) a writhing mass of brown and green. The more courageous visitors were carrying the less courageous ones from their cars and into the building. Every morning the grasshoppers were piled up 50 thick in front of the doors. People were afraid to enter the restrooms for fear of attack. One brave caller even found a grasshopper in the pay phone coin return!!

The park began to get some pressure from the farmers nearby. You see, Golden Spike is a park 15½ miles long but only 400 feet wide (the historic railroad grade of the Pacific Railroad) and lies in the heart of rich wheat farming country. The snake-like shape of the park meant that Golden Spike was a strip of land where the hoppers could multiply without the worry of insecticides. So, the hoppers began to commute from Golden Spike to the wheatfields for the day and back to the park at night. Golden Spike had become a grasshopper bedroom community!

It was definitely time to call GRASSHOPPER BUSTERS! Park rangers donned their "buster suits" quickly and took to the offensive. Because the grasshoppers were getting into the visitor center and eating all the house plants (not to mention creating havoc for anyone wearing shorts in the dark auditorium), a first course of action was to place a "NO GRASSHOP-PERS" international symbol sign on the entry doors. A written sign was not used because grasshoppers are believed to be illiterate.

Next, the entry way needed to be cleaned up and grasshopper-proofed. An intensive hourly sweeping program was initiated, but the grasshoppers were quickly gaining. GRASSHOPPER BUSTERS realized that the hoppers had to be removed for good: it was time for drastic action. The dry-vac was brought from the wood shop and the green and brown troublemakers were quickly sucked into oblivion! But even so, the hordes continued to converge on the shady path-way and the vacuum was set aside as inadequate.

It was time to get a good look at the enemy and get a fix on what kind of numbers were really "out there." So, a one square yard frame was constructed that would allow GRASSHOPPER BUSTERS to count the enemy more accurately. The frame proved ineffective – the incredible numbers were impossible to count as the grasshoppers jumped in and out of the frame. Back to the drawing board. GRASSHOP-PER BUSTERS put sides on the frame, a small opening on one end, and christened the new contrap-tion the "Lazy G Grasshopper Corral and Roundup."

When put into place one GRASSHOPPER BUST-ER herded the hoppers through the opening while the other counted the escaping enemies. Initial counts were shocking . . . 80 per square yard . . . 113 per square yard . . . and, in a particularly green area, 338 grasshoppers per square yard!! With counts like these, even GRASSHOPPER BUSTERS had doubts about their chances. With consultation, approval, and financial support from the Rocky Mountain Regional Office, it was decided to bring in the granddaddy GRASSHOPPER BUSTER of them all – *Nosema locustae*, a protozoan grasshopper spore disease which affects only grasshoppers and spreads through the population by cannibalism. This was no longer war . . . this was biological warfare!

The *Nosema* spore was mixed in liquid form and sprayed onto wheat bran. The bran was then broadcast on park property from a fixed wing aircraft.

Local land owners were pleased that GRASSHOP- PER BUSTERS at Golden Spike were taking serious action. They showed interest in the utilization of biological control, but themselves chose to spray chemical insecticides, which would bring immediate results. The *Nosema* would take several weeks, but the contest was on!

GRASSHOPPER BUSTERS now turned to their plots and began taking weekly counts. If *Nosema* was working, the grasshopper numbers would start to decline. It took a few weeks, but the numbers started to drop . . . significantly. The plot with the very high density showed 73 live and 41 dead after two weeks. One month later, the same plot had 7 live and 42 dead grasshoppers. It looked like a rout for the granddaddy GRASSHOPPER BUSTER. Needless to say, the farmers fell in love with the Golden Spike GRASSHOPPER BUSTERS, especially granddaddy *Nosema*.

Counts will continue into next year. The *Nosema* disease inhibits egg laying in the Fall, and is passed on to the next generation in the egg pods.

With August here at Promontory no one is talking about grasshoppers. There simply are not many around any more. The hoppers are supposed to be just as bad next year, but GRASSHOPPER BUST-ERS will be here to keep an eye on them. But for now, gosh . . . does anyone know a good MOSQUITO BUSTER?!

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