



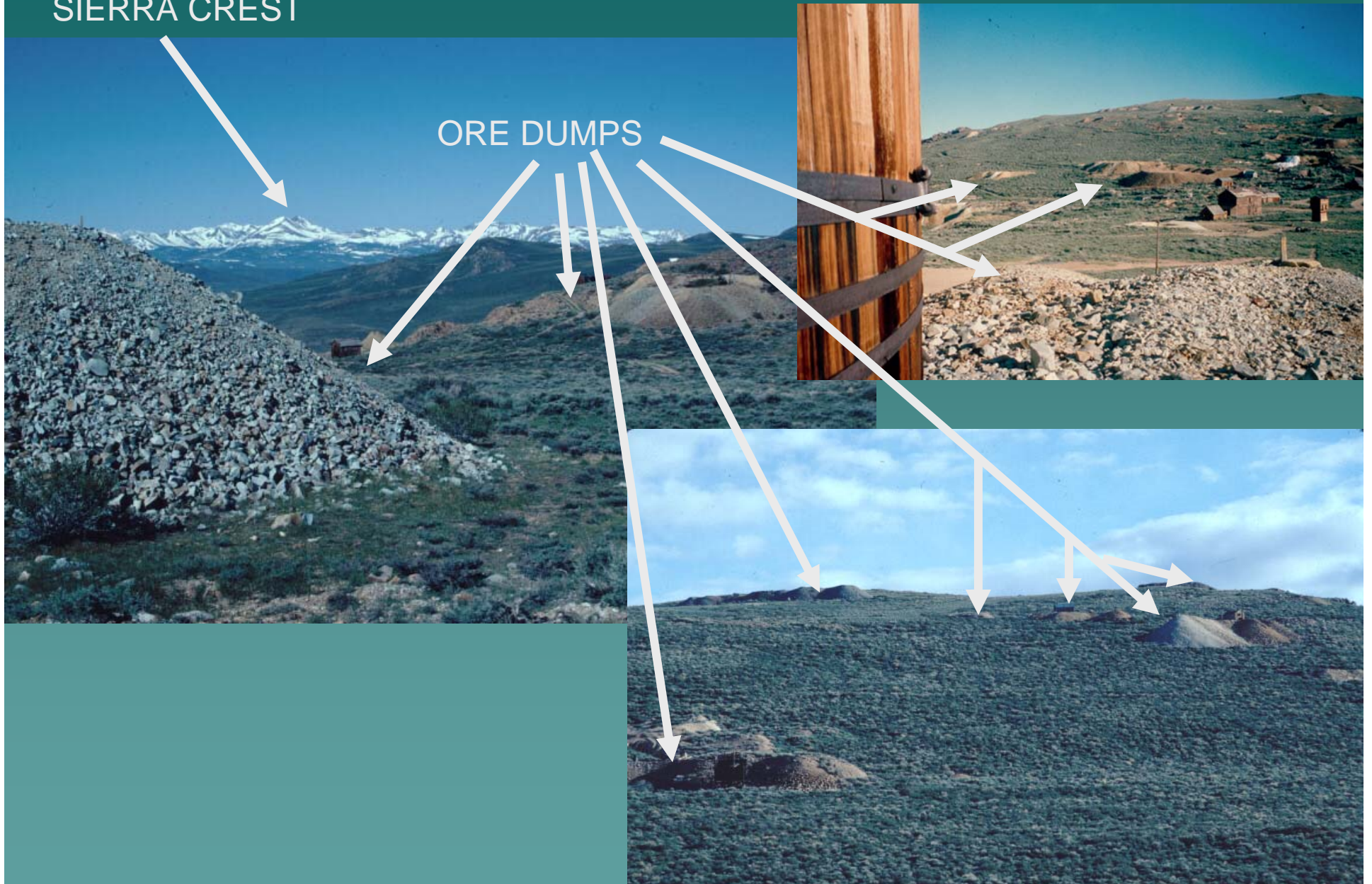
# BODIE UPDATE

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# FOCUS ON BODIE

SIERRA CREST

ORE DUMPS





# BODIE PIKAS OCCUPY THE PERIPHERY OF MOST ORE DUMPS



← AND SOMETIMES OLD MINING ARTIFACTS

# DIET PRIMARILY GREAT BASIN VEGETATION

PIKA SIGN!



PIKAS DO NOT NEED  
ALPINE MEADOW  
VEGETATION TO THRIVE

Sagebrush (*Artemisia tridentata*)

Bitterbrush (*Purshia tridentata*)

Rabbitbrush (*Chrysothamnus  
nauseosus*)

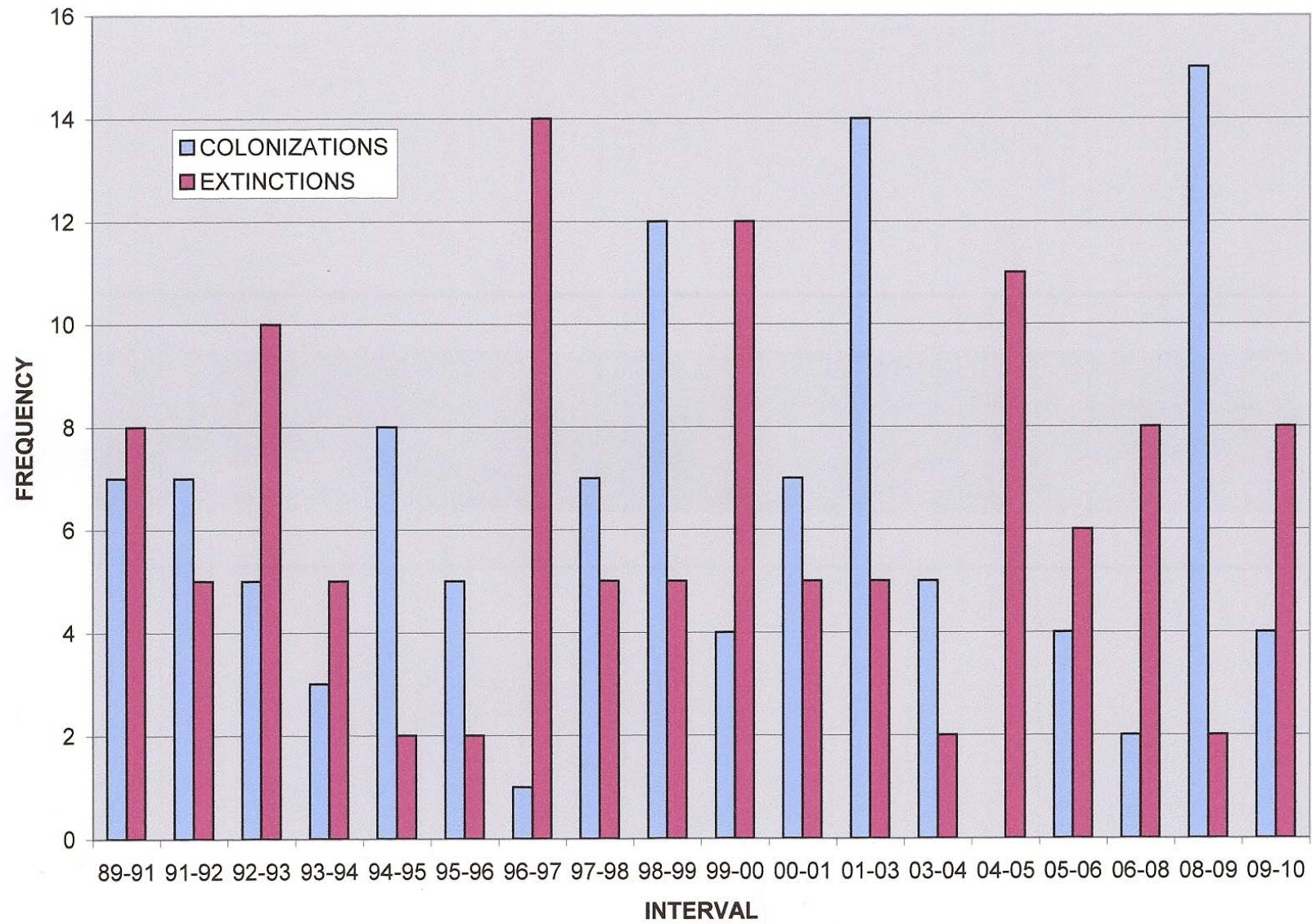




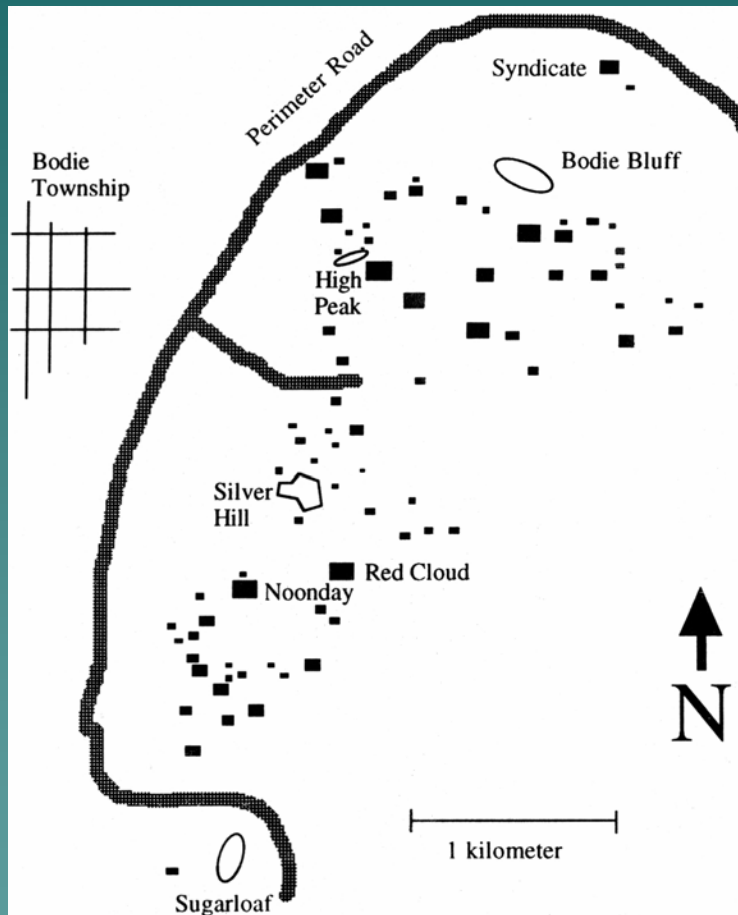
# METAPOPOPULATION DYNAMICS

- ◆ Bodie pikas exhibit one of the best examples of a metapopulation – with a constellation of habitat patches (ore dumps); each patch has a probability of occupancy, population extinction, and subsequent recolonization
- ◆ Over the past 18 census intervals between 1989 – 2010 (a couple of two-year gaps!), the number of patch colonization events (110) was nearly equal to the number of populations that went extinct on patches (115).
- ◆ Yet, each year the number of patches colonized and on which a pika population went extinct varied greatly.

## BODIE PIKA METAPOPOPULATION TURNOVER



# PIKAS AT BODIE



Total Percent Patch Occupancy from 20 Censuses 1972-2010 (almost every year since 1989; 76 isolated patches)

Average = 39.4% occupancy

Range 23.7-58.7%

Southern patch constellation began to collapse (meta-population collapse) in 1989; semi-complete collapse by 1991

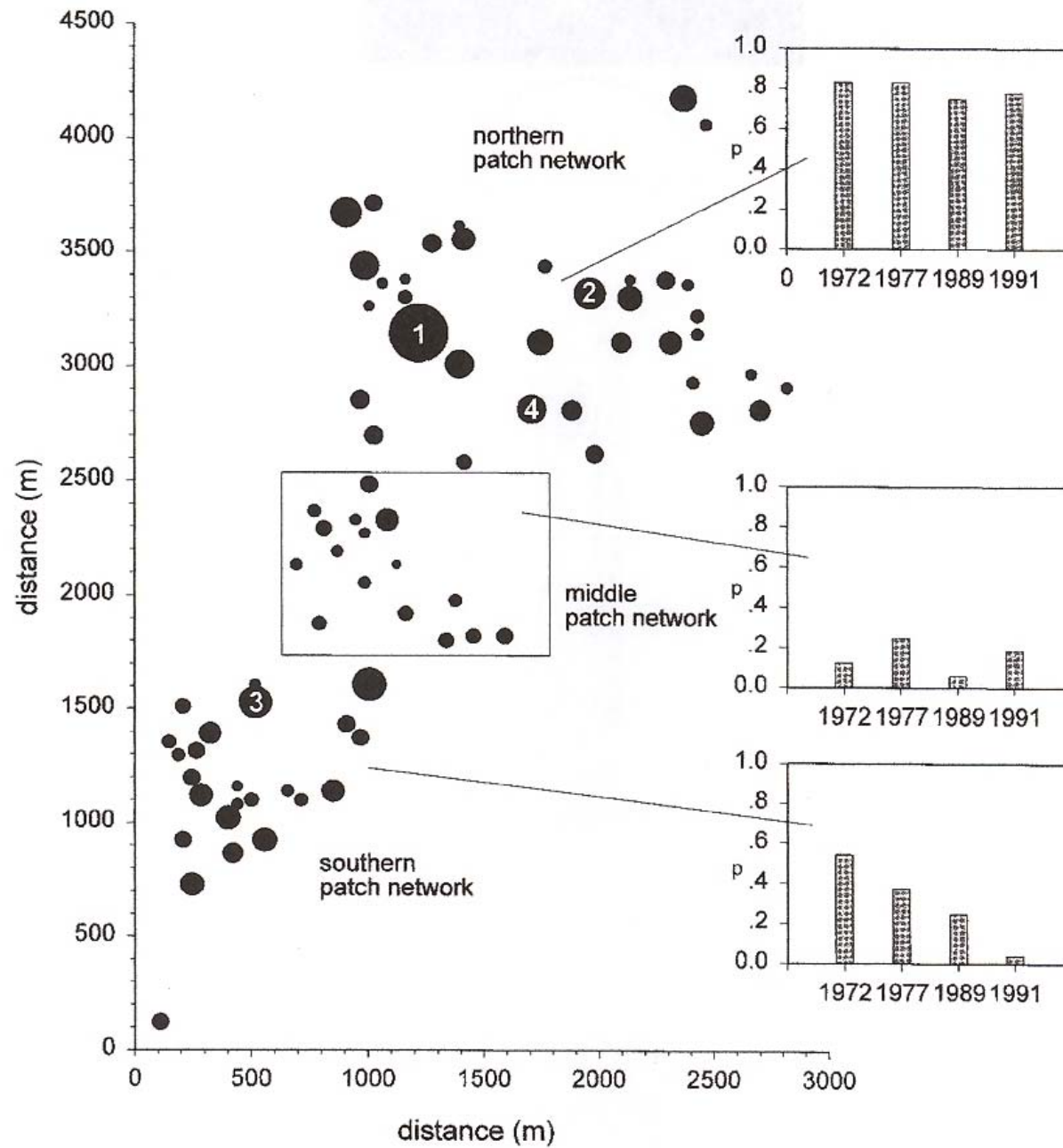
Northern Constellation of Patches

Average = 70.2% occupancy

Range 48.6-88.2%

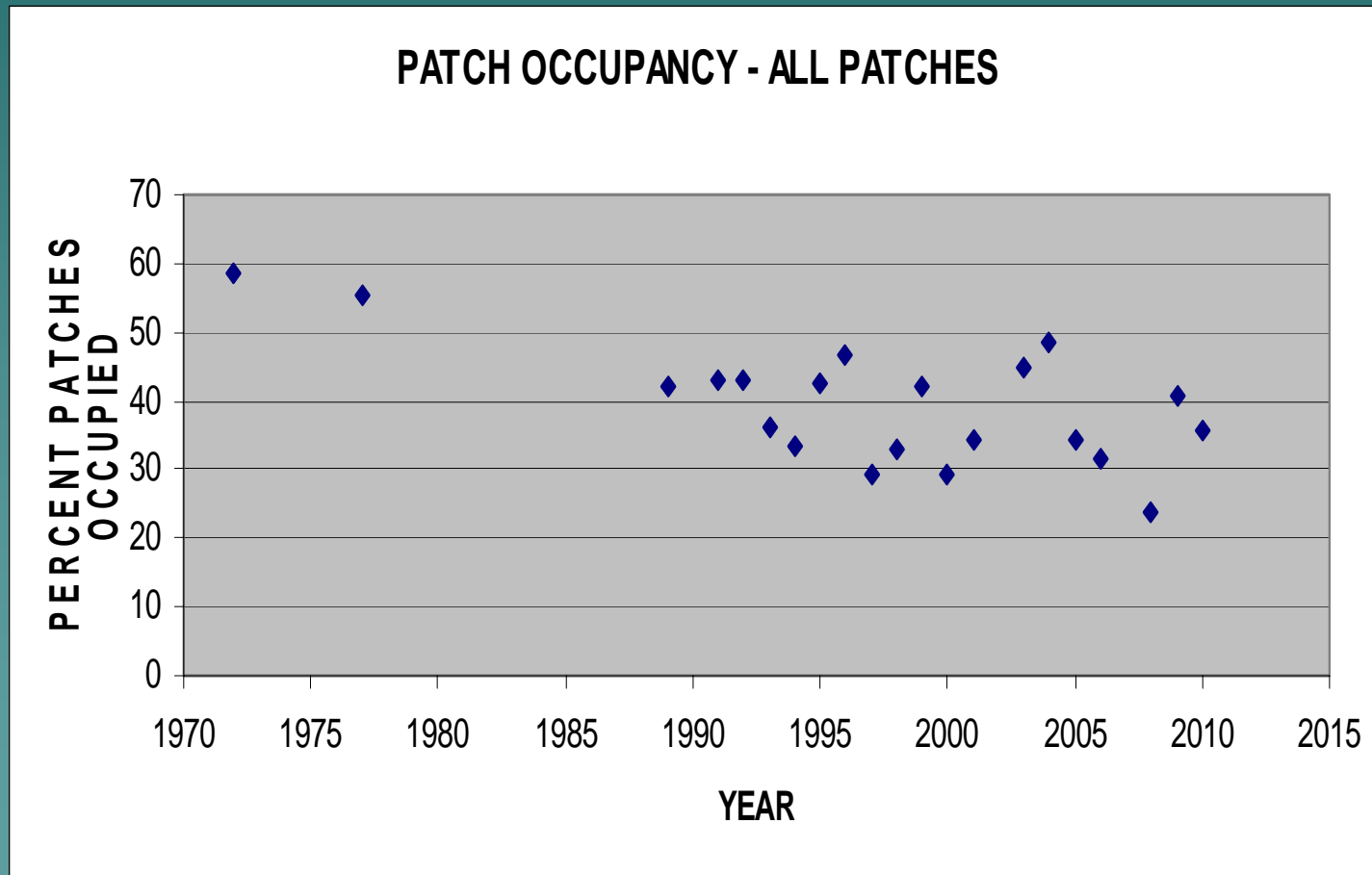
1972 = 83.3% occupied

2009 = 83.8% occupied

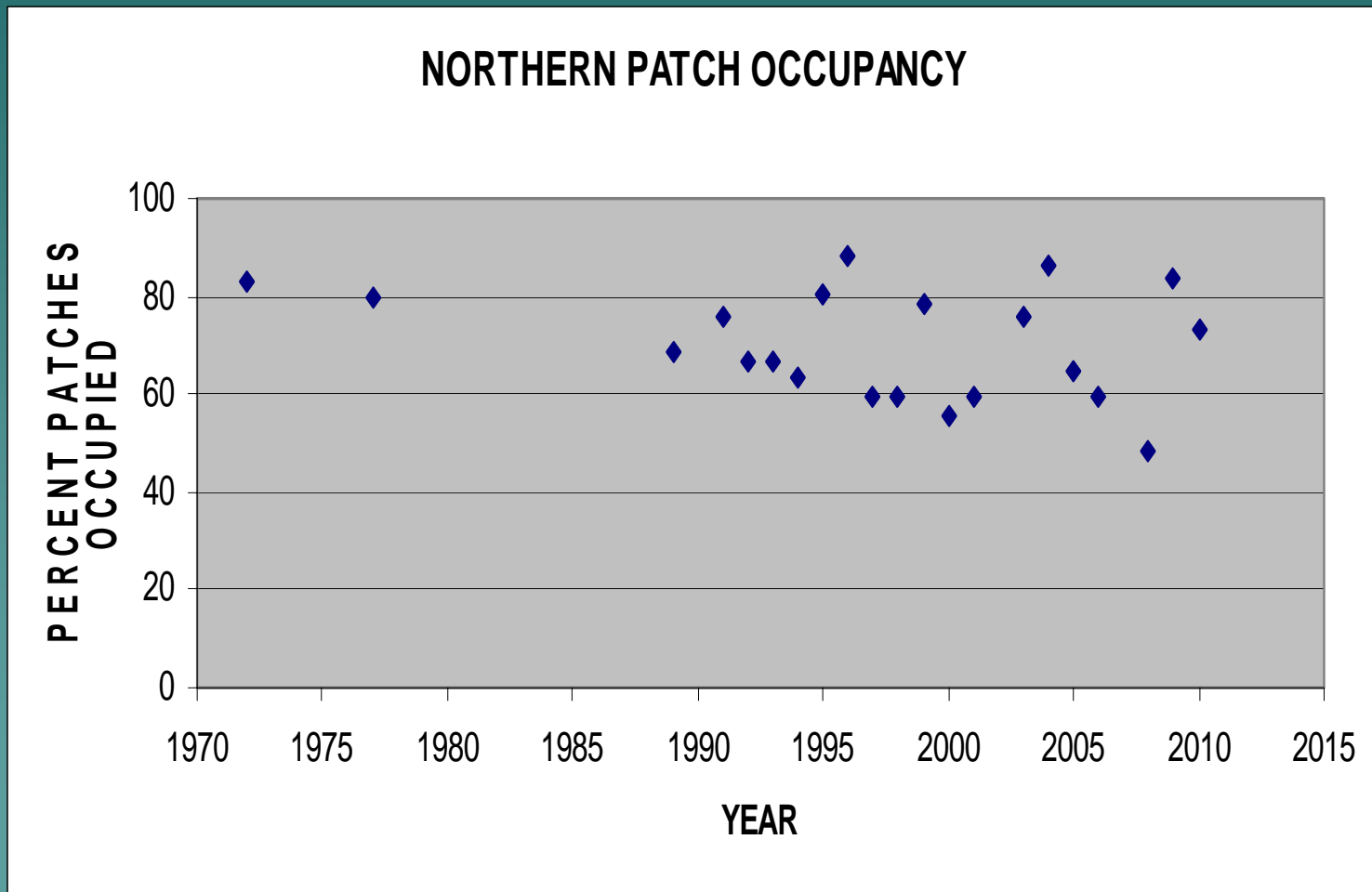




# PERCENT PATCH OCCUPANCY ALL PATCHES

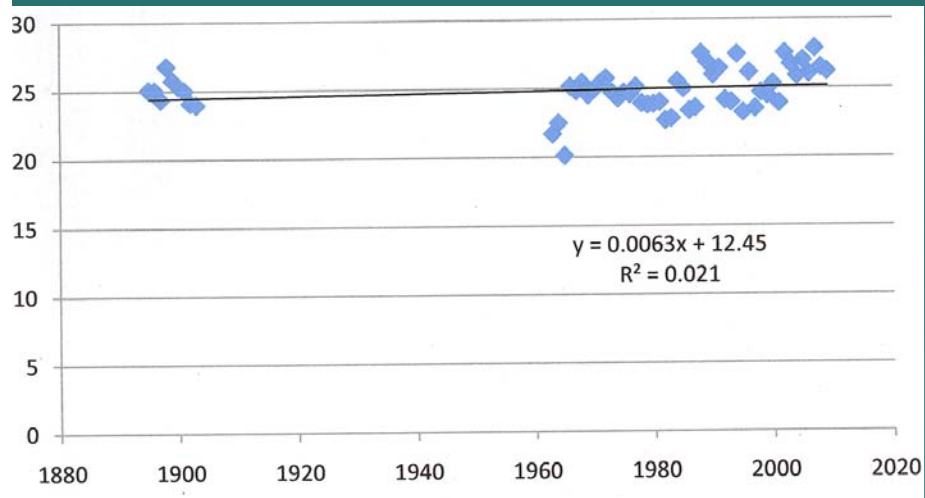


# PERCENT PATCH OCCUPANCY NORTHERN PATCHES



# TEMPERATURE TRENDS AT BODIE

JULY



AUGUST

