

Name \_\_\_\_\_

## “Boreal Birch: Art and Science in the Northern Forest”

Study questions for students in Grades 9-12

1. Compare Klass’s “Winter Birch,” Woodward’s “Color in the Forest,” and McWayne’s “Rime-Weighted Birch— Chena Bike Trail”. How are these pieces similar? How are they different? Where would you place each of these pieces on a scale with “realistic” on one end and “abstract” on the other:

Realistic ←-----|-----→ Abstract

2. After reading the text panel “**Birch— growing in the boreal forest,**” how do you think the landscape depicted in Klass’s “Nenana Burn” will look after a few years (as it enters the first stage of regrowth or succession)? About how many years it will it take until you can expect it to be a birch forest again?

3. After reading “**Birch as hosts: lichens and fungi,**” consider McWayne’s photograph “Birch and Lichen.” What does the lichen indicate about the health of this tree? If the tree had fungus attached to it instead of lichen, what would the fungus indicate about the health of the tree?

4. After reading **Fire in the boreal forest** and **Birch in mythology and folklore**, why do you think birch has developed a reputation as a protective tree to plant around homes and communities?

5. This exhibit brings together multiple perspectives on birch trees from both art and science. Do you think scientists should incorporate art into their scientific studies? If so, how? Do you think art should be scientifically correct? Why or why not?