

# LASER ETCHED ARMOR & PAULDRON

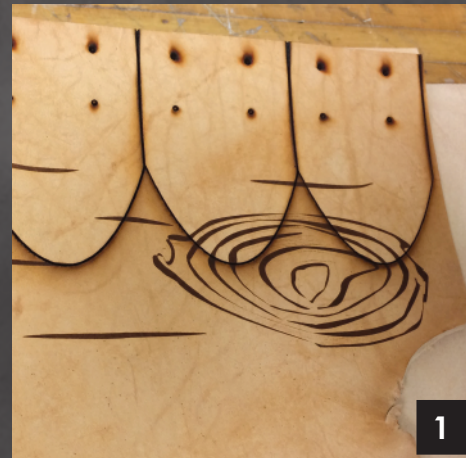
Masks and Armor Class: Spring 2016

Reference image of Birch Bark



Inspired by my desire to use the laser cutter on campus, I made scale armor that was etched to appear as if made of birch tree bark. I did some samples of fully cut scales but didn't like the harsh laser line along the edge (1). The laser cutter did cut great lacing holes in addition to the etching so I cut my leather hides into strips and was able to quickly work them through (2). While using the laser I also etched some larger pieces of leather to be used in the pauldron. I saved a lot of time with the sections that were laser cut but each point was marked and cut by hand (4).

There were about 400 scales. In addition to the vegetable tanned leather scales there were a number of scales in different colors and leathers used as accents (5). Beginning to lay out all of the scales I discovered that making a pattern would be better than something random because it took away the chance of accidental patterns (6). When I had a pattern developed I began lacing the rows together starting from the bottom. Back view of laced panel (7). The yoke is made of chrome tanned leather that has been aged with paint and bound in leather at the edges. It is riveted on each side to the scale plates. The weight of the armor plates is supported by two strips of webbing that run from front to back over the shoulder and attach to the plate half way down on both sides.



The sides of the armor close with leather straps that buckle. I constructed double straps from a lighter weight leather and dyed them a darker brown to match the scales. Straps are riveted to scale plates (8).

The pauldrons were constructed with vegetable tanned leather that was emersed in hot water (9) and then was stretched over headblocks to dry and give shape (10). When the pieces were dry they got trimmed down and riveted together with straps (11). A large strap was added to hold the pauldron to the body. The entire collection of armor took 59.5 hours. 5.5 hours for the pauldron and 54 hours for body armor this is because of the time spent hand cutting the leather scales (25 hours)

