Growing up in Florida, WUDPAC Fellow Katherine “Kiki” Peters loved the seashells that her grandparents collected and displayed throughout their home. This year, as a second-year objects major, she requested a treatment project that contained shells. The program obliged by providing an ornate silver spoon with a shell, likely mussel, bowl that had been in storage at the museum.

The oval-shaped shell has a smooth texture and is colored brown along the rim, changing to purple and then to white in the center. The spoon was acquired in 1988 from a private collector.

When she examined the spoon, Kiki found tarnish on the silver handle and a distracting line of excess yellowed adhesive from a past repair to the bowl. This ran upward, just off center, from one of three rivets attaching the handle to the bowl’s tip. Additionally, the repaired join fit together unevenly.

Kiki’s treatment goal was to restore the spoon to a closer approximation of its original appearance by polishing the handle and addressing the past repair. She first cleaned the spoon overall with a soft brush, followed by gentle cleaning with either deionized water or ethanol to remove dust and grime. She next conducted solubility and microchemical spot tests on the adhesive and found it to be cellulose nitrate. Cellulose nitrate-based adhesives were used widely throughout much of the 20th century, but they have long since been replaced in conservation by more stable materials.

When acetone on a cotton swab did not reverse the join, Kiki applied an acetone poultice to the join and wrapped the area in plastic cling wrap to stop evaporation. Although this worked, she was still unable to make the two pieces match together evenly. After working under the microscope to further remove remaining traces of the adhesive, however, she was able to achieve precise join alignment.

Kiki turned next to a few small losses visible in the shell bowl. She filled them with acrylic-based mediums and then inpainted the fills with acrylic paints to help them blend into the rest of the shell. Her final step before returning the spoon to storage at Winterthur was to polish the silver handle. Now that the treatment is finished, she looks forward to sharing photos of the final product with her grandmother who, now widowed, continues to live surrounded by the seashells she and her husband collected.