

# KONZERVATORSKO-RESTAURATORSKI RADOVI NA GORNJEM DIJELU KOLONADE I LUKOVIMA

## CONSERVATION-RESTORATION WORKS ON THE UPPER PART OF THE COLONNADE AND THE ARCHES



Zbog izloženosti kiši, kamene površine istaknutih dijelova vijenca su erodirane, a fini detalji klesarske obrade potpuno izgubljeni. U sljubnicama između kamenih blokova stanište su pronašle više biljke. Na površinama koje su izložene kiši razvile su se kolonije mikroorganizama, a na onima koje su od kiše zaklonjene formirale su se debele crne kore (SI. 1).

S gornje plohe vijenca kolonade su uklonjeni ostaci električnih instalacija, rasvjetna tijela i njihovi nosači, koji su bili sidreni izravno u kamene blokove kolonade. Mehanički je, ručnim klesarskim alatima, odstranjen debeli cementni nanos, pazeći da se ne ošteti struktura kamena. Kako bi se osigurao primjereno pad za odvod vode, gornja ploha vijenca kolonade ožbukana je umjetnim kamenom. Na ovom je pokrovu izvedena okapnica od olovnih ploča (SI. 3).

Nakon što su odstranjene biljke iz sljubnica, na kamene je površine naneseno biocidno sredstvo. Kamen je zatim čišćen vodenom parom pod tlakom.

Iz sljubnica su uklonjeni ostaci veziva. Fugiranje je izvedeno akrilno-vapnenom žbukom.

Uklonjene su cementne i druge zakrpe, izvađeni željezni predmeti sidreni u kamen i konsolidirani nestabilni dijelovi kamena.

Anorganska onečišćenja su odstranjena metodom laserskog čišćenja (SI. 2, SI. 4). Na mjestima gdje su crne kore bile izrazito debele, prije čišćenja laserom su mehanički stanjene. Rekonstruktivni zahvati izvedeni su umjetnim kamenom.

Gornje plohe lukova i natprozornika su ožbukane kako bi se osigurao primjereno nagib za pad vode.

Because of exposure to rain, the stone areas of the protruding parts of the cornice had been eroded, and the fine details of the carving had been totally lost. In the joints between the ashlar, several plants had found habitats. On surfaces exposed to rain, colonies of microorganisms had developed, and on those that were protected from the rain thick black crusts had formed (Fig. 1).

The remains of electrical wiring, lighting units and their mountings that were anchored directly into the ashlar of the colonnade were removed from the upper surface of the cornice of the colonnade. With carvers' hand tools, the thick application of cement was mechanically removed, care being taken that the structure of the stone should not be damaged. In order to provide a proper slope for the drainage of water, the upper surface of the colonnade cornice was plastered with artificial stone. And on top of this covering a coping of lead sheeting was provided (Fig. 3).

After the plants had been removed from the joints, a biocidal preparation was applied to the stone surfaces. The stone was then cleaned with pressurised steam.

The remnants of the binder were removed from the joints. Pointing was carried out with acrylic-lime mortar.

Cement and other patches were removed, the iron objects anchored in the stone were removed and the unstable parts of the stone were consolidated.

The inorganic dirt was removed with the method of laser cleaning (Fig. 2, Fig. 4). In places where the black crust was particularly thick, they were removed mechanically before the laser cleaning.

Reconstructive operations were carried out with artificial stone.

The upper surfaces of the arches and the lintels were plastered in order to ensure an appropriate slope for the fall of water.