



CONSTGLASS



Epidian® 53



| Pilot objects | Krakow |
|--------------------------------------------------------------------------------------|----------------------------------------------------------------------------------------------------------------|
| Bay (date) | Smolensk 9, staircase, bay 1, 1913 |
| Exposure - protective glazing | not |
| Composition of the product | epoxide resin: Epidian® 53 (or 55) with amino hardener (100 : 10) |
| Application: date (age of product); studio ; protocol | seventies - eighties of 20th c. (?). |
| Morphology | |
| Direct observation | yellowing, partly poor adhesion to glass |
| SEM observation | hairline breaks |
| Desktop Xrays tomography | poor penetration into breaks |
| Synchrotron tomography | poor penetration into breaks |
| Chemical behaviour | |
| FTIR | epoxide resin, but probably not Epidian® |
| Raman spectroscopy | not made |
| Mechanical behaviour | |
| | |
| Contamination | |
| fungi | glass - low , putty possible |
| bacteriae | glass - low , putty possible |
| Active infestation | |
| Biological activity | no |
| Microbiological susceptibility | |
| | low |
| Reversibility | |
| water-ethanol mixture | no |
| n-pyrrolidone | no |
| other | no |
| Retreatability | |
| good adhesion | not possible |
| poor adhesion | |
| General observations | |
| Mechanical removal of not adhered parts, removal fo strong adhered ones not possible | temporary fixing of cleaned glass with Paraloid® B72 (15% toluene) |
| Recommendations | |
| Safety/healthy | well ventilated area, protective gloves |
| Preparation | cleaning of bonded surfaces |
| Application | on cleaned breaks only |
| Future conditions of conservation | no protective glazing, mechanical removal was possible, bonding breaks with epoxide (Aralidite® 2020) possibly |