

# Subject Index

## A

accelerated aging, 342-358, 227-253  
accelerated testing, 73-83,  
84-110  
accelerated weathering, 391-412,  
3-14  
acrylic, 84-110  
acrylic sealant, 391-412  
acrylic terpolymer, 38-72  
adhesion, 38-72  
adhesive attachment, 135-156  
adhesive bonding, 227-253  
adhesive failure, 15-37  
aging resistance, 135-156  
Arrhenius, 111-134  
artificial weathering, 73-83, 84-110

## B

bomb blast, 277-301  
bond strength, 342-358  
bonded, 111-134  
bonding design, 254-274

## C

capability evaluation, 15-37  
CFRP, 342-358  
characterization, 328-341  
cohesive failure, 15-37  
correlation, 3-14  
crazing, 391-412  
curtainwall, 277-301  
cyclic climatic testing, 227-253  
cycling, 313-327

## D

deformation, 313-327  
dimensional stability, 185-199  
durability, 342-358, 185-199,  
111-134, 391-412, 38-72, 157-164,  
313-327  
durability design, 254-274  
durability evaluation, 15-37

## E

elastic recovery, 38-72  
elastomers, 313-327  
expansion-compression cycle test,  
165-182

## F

fatigue, 73-83, 84-110  
fault tolerance, 359-387  
FE analysis, 254-274  
flexibility, 38-72  
flexural strength, 342-358  
fluid migration, 217-226  
freeze-thaw testing, 227-253

## G

glass, 217-226, 135-156

## H

hardness, 38-72  
high speed, 277-301  
hybrid, 157-164  
hygrothermal testing, 227-253

**J**

- joint, 111-134
- joint deficiencies, 359-387
- joint geometry, 254-274
- joint movement, 302-312

**L**

- lap shear, 185-199
- lifetime, 111-134
- light curing acrylates, 135-156
- loading rate, 277-301

**M**

- mechanical characteristics, 15-37
- metal, 135-156
- modulus, 328-341
- movement, 313-327
- movement rate, 277-301

**O**

- out-door exposure, 302-312
- outdoor exposure, 3-14
- outdoor weathering, 73-83, 328-341, 38-72, 84-110

**P**

- pavement joints, 15-37
- peel adhesion, 185-199
- performance, 15-37
- Polyurethane, 38-72, 3-14
- Polyurethane sealant, 391-412

**R**

- regional factor, 302-312
- resistance, 157-164
- review, 73-83

- rheology, 313-327
- rheometry, 313-327
- RILEM TC 139 DBS, 3-14

**S**

- sealant, 302-312, 277-301, 328-341, 313-327
- sealant failure, 359-387
- sealant joint, 217-226
- sealants, 73-83, 3-14, 84-110
- sealed, 111-134
- service life, 111-134
- silicone, 277-301, 217-226, 38-72, 157-164, 313-327, 84-110
- silyl terminated polyacrylate, 165-182
- strain, 328-341
- strength reduction factor, 342-358
- structural bonds, 135-156
- structural glazing, 254-274
- structural silicone, 185-199
- substrate suitability, 185-199
- superimposed loading, 15-37
- system evaluation, 15-37
- system test method, 15-37

**T**

- telechelic polyacrylate, 165-182
- tensile strength, 342-358
- testing, 359-387
- thermo-mechanical, 157-164
- tilt-up, 391-412
- toughness, 38-72

**U**

- UHPC, 227-253
- UHPFRC, 227-253

Ultra-High Performance Concrete,  
227-253  
urethane, 84-110

## W

water immersion, 111-134  
water penetration, 359-387  
watertightness, 359-387

weatherability, 302-312  
weathering, 157-164  
weatherseal, 157-164  
window, 277-301