Mathematics & Art

By various mathematical artists
Assembled by Carolyn Yackel
Mercer University
Chris Palmer: Flower Tower Origami Fold
Doug Dunham—Circle Limit III type pattern
Rinus Roelof—Knot
Robert Fathauer—Twice Iterated Knot No. 1
Rinus Roelofs—Tapestry
Rinus Roelofs—3D tapestry
Anne Burns—Produced by a subgroup of Mobius Transformations
M.C. Escher: Metamorphosis
Craig Kaplan, top; Florence Turnour, beads, bottom—Parquet Deformations
Akio Hizume: Fibonacci Tower
Akio Hizume: Fibonacci Tower
Anamorphosis onto a sphere (From Make mag., flickr fdecomite)
Anamorphosis onto a cylinder
Tom Hull
Paul Prudence: Talysis II
Paul Prudence: Talysis II another view
Daina Taimina—Crocheted Hyperbolic Surface
Helaman Ferguson: Figure Eight Knot Complement
George Hart photo: Cutting a Bagel into two linked halves
Helaman Ferguson: Incised Torus Wild Sphere
Carlos Seguin: 48 Bird Tetrus
Bjarne Jespersen—Dual Plane Toroid
Helaman Ferguson: Torus and Crosscap
Emily Peters: Knitted Cross-Cap
Carlo Seguin: Boy’s Surface
Chris Palmer
Jeannine Mosley: Origami Tessellation
Chaim Goodman-Strauss—632 tessellation
Jeanine Mosley: Herringbone Origami Tessellation
Robert Fathauer: Seahorses and Eeels
Irena Swanson—quilted semi-regular tessellations
Chris Palmer—Shadowfold
The chief reason for studying regular polyhedra is still the same as in the time of the Pythagoreans, namely, that their symmetrical shapes appeal to one’s artistic sense. -H.S.M. Coxeter
George Hart: Roads Untaken
Jeannine Mosley: Star Ball
Carlos Seguin with Jane Yen—12 Fish 4 colors
Holger Stroem: IQ light
Tom Hull—made with PHiZZ Units
Carlo Seguin: Sushi Bars
George Hart: Dragonflies
Carlo Seguin: E Leaves
Tom Hull: Five Intersecting Tetrahedra
Chiam Goodman-Strauss—Using a paper Grid to model
Chaim Goodman-Strauss Sculpture for G4GX
Robert Longhurst: Arabesque
Breckenridge Snow Sculpture 2000 (Design: based on Longhurst)
Breckenridge Snow Sculpture 2002  (Designer: Grossman)
Vladimir Bulatov: rhombic tricondahedron
Breckenridge Snow Sculpture 2003 (Designers: Collins & Seguin)
Akio Hizume: Mumagari (quasiperiodic)
Akio Hizume: Mumagari detail
Hinke Osinga with metal sculpture
Hinke Osinga and Bernd Krauskopf: Lorentz Surface
Bathsheba Grossman: Noom
Bathsheba Grossman Lamps
George Hart: Echodermania
Gwen Fisher: Chaos and Order
Robert Fathauer: Fractal Tree No. 1
Robert Fathauer—Fractal Tree No. 4
Included Artists

Vladimir Bulatov          Craig Kaplan
Anne Burns                Scott Kim
Bob Bosch                 Berndt Krauskopf
Brent Collins             Robert Longhurst
Doug Dunham               Jeannine Mosley
M.C. Escher               Hinke Osinga
Robert Fathauer           Chris Palmer
Helaman Ferguson          Emilly Peters
Gwen Fisher               Paul Prudence
Gary Greenfield           Rinus Roelofs
Chaim Goodman-Strauss     Carlo Seguin
Bathsheba Grossman        Holger Stroem
George Hart               Irena Swanson
Akio Hizume               Florence Turnour
Tom Hull                  Daina Taimina
Bjarne Jespersen

This presentation was not comprehensive. Many other exciting mathematical artists exit!