A cube, topped with a cylinder, topped with a sphere - all spare lines and undecorated geometry - the tombstone of Friedrich Fröbel (1782-1852) is a curious, seemingly obsessional monument. I imagine it is the most unlikely object in the German cemetery where the inventor of kindergarten is buried. A picture of the tomb, as depicted on a commemorative card c. 1890, was among the dozens of pieces of Fröbel-related ephemera on display in 'Philosophical Toys'. Curated by Cabinet magazine editor Sina Najafi, the show presented this historical material in conjunction with more recent quasi-pedagogical artefacts: an alphabet in origami by electrical engineer Jeannine Mosely and models constructed by amateur logician Shea Zellweger. None of the three is, properly speaking, an artist or designer. Call them inventors, maybe - innovators of educational technologies and visual languages - but all are primarily concerned with form, with hidden homologies between the way things look and how they mean.

For Fröbel, who trained as a crystallographer, geometric form was the skeleton key to the mysteries of the universe - that conceptual realm where the scientific, the aesthetic and the spiritual linked up and overlapped. Wanting to spread his theories, he chose the young and easily moulded as his subjects. Kindergarten, the revolutionary educational system he devised, was meant to introduce children to the harmonies underlying the natural world. Fröbel's programme progressed through a series of 20 pedagogical 'gifts': toys and simple crafts offered for directed play.

Examples of the gifts, along with instruction manuals and photographs of classroom activities, made up the bulk of 'Philosophical Toys'. The objects ranged from simple crocheted balls for infants to more intricate design exercises involving blocks, tiles, sticks and rings. With its cutting and weaving and assembling, kindergarten was intended to stress creativity and physicality over rote learning. (Though, to be honest, Fröbel's finicky activities don't really seem like much fun. The archival photos of earnest children working away on their gridded desks make the whole thing look like a sort of semi-industrialized handicraft operation.)

Whatever its Utopian and spiritual vision, kindergarten also provided lessons in abstraction - in refining forms to their most stark and basic, and then building back up from the essentials. It's a fairly easy leap from the grids and stark rectilinear designs crafted by 19th-century kindergartners to the kind of Modernist work that appeared in the art world a few decades later. And that's precisely the claim made by Norman Brosterman (who selected the Fröbel objects for the show) in his 1997 book Inventing Kindergarten. The study argued that Wassily Kandinsky, Le Corbusier and Piet Mondrian, among others, originally picked up their aesthetic leanings in kindergarten classrooms.

But 'Philosophical Toys' was not intended to advance this thesis. While Najafi, in his brief essay for the show's brochure, referenced Brosterman's work, no such argument was made explicit in the display itself. Nor were any of the connections between Fröbel's system and other contemporaneous spiritual, artistic and educational movements made clear. Instead, the objects were mostly left to stand on their own, simultaneously homespun and rather strange. By suppressing history, the show ramped up the idiosyncrasy of Fröbel's Utopian project, all the nutty specificity of his 20-step schema. If kindergarten hadn't been so successful, it would probably seem like a crackpot idea.

Zellweger may or may not be a crackpot. (In an interview published in last summer's Cabinet he seemed lucid and sensible, if a little disconnected from the mainstream.) From the evidence on display it was hard to tell. Described as an 'outsider logician' in the didactic material, the dis-

play of his work seemed designed to present him as a kind of mathematical Henry Darger. His concept, as far as one could make out, involves replacing the standard notation for symbolic logic with symbols of his own devising. The way these symbols are flipped and reversed supposedly reveals the symmetries and patterns inherent in logical operations themselves. His home-made constructions, intended to demonstrate the workings of this system, were lovely but fairly impenetrable, meant to be marvelled at more than understood. Mosely's folded paper alphabet, meanwhile, could be read as either an

cared about origami. Taken as a whole, the effect of 'Philosophical Toys' was certainly less

Philosophical Toys

trick, depending on how much one

educational than any of its subjects would probably have intended. The convoluted philosophies that inspired these 'toys' were hinted at more than elaborated on. As such, the show occupied an odd middle ground between an earnest historical or scientific exhibition and a Museum of Jurassic Technology-type display of curiosities. Understanding was not the goal here. But the sort of thinking that spins out universes of interconnections can produce hermetic yet evocative artefacts. Like Fröbel's strange tombstone, they are often worth looking at for their own sake.

Steven Stern

