Thinking in Future Tense
Inventor Stewart Brand plans a millennial clock to remind people of the long-term

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Got millennium fever? Stewart Brand has the cure right here in his Presidio office. Step right up to the prototype of the world's slowest computer and the world's largest mechanical clock. If he's right, the very idea of a clock that chimes once a century will teach people to break through the 2000 barrier and learn to project.

Part art installation, part entertainment and part political statement, the giant Long Now clock -- maybe as big as Stonehenge -- will be built in the desert and made to last for 10,000 years. Brand hopes the clock will become a destination point.

The Sausalito inventor and futurist best known for founding "The Whole Earth Catalog" and the Well, the first cyber-community, explains the concept in his new book, "The Clock of the Long Now" (Basic Books; $22).

He must, because of all the puzzled stares. "There is a small percentage of people who are instantly taken with the idea of a millennial clock," Brand says. "Right away they want to know things like how will we protect the clock from vandals for all those years?" Unfortunately, he adds, "a much bigger percentage say to me, 'Stewart, what is the point, exactly?'"

With everything moving so fast in our high-tech world, Brand says, it's easy to think only of immediate goals. But he is passionately convinced that it is time to think of the deep future, to take responsibility for future generations. The clock, a slow computer that will keep perfect time for the next 10,000 years, can help people see beyond the immediate, he says.

If it all works out, the clock and its desert environment should be inviting, intriguing and unique. Visitors will be led inside a mountain cave to the base of the clock where the giant pendulum swings, then up a spiral staircase (think Statue of Liberty), through a low ceiling and up through the innards of the clock, all the way to the great dial. When visitors reach the top they will be in a huge room several stories tall. The dial will be set in motion by the heat of the sun reflected off a hemispherical mirror, and the clock will be powered by seasonal temperature changes. Also on the
grounds will be a vast library.

But for now, Brand has to content himself with the 4-foot-high prototype. He gazes lovingly upon the shiny hard metal object sitting in the corner of his office -- an Art Deco-like cylinder made of tungsten and brass (the brass will be replaced with Monel, an alloy of nickel and copper that is very resistant to corrosion). When completed, it will have gears, rings, shafts, a classic three-ball pendulum, brakes, weights and columns. It will tick once a year, and a cuckoo will come out at each millennium.

``a guy thing''

``My wife reminds me, and I confess, the clock is kind of a guy thing,'' he says, smiling.

``The ambition and folly of the Clock/Library,'' Brand writes, ``is to reframe human endeavor, and to do so not with a thesis but with a thing. All this thing can do is give permission to think long term, if it succeeds in that, the rest may follow."

At midnight December 31, the clock will mark the turn of the century before going silent for 100 years. ``The clock will treat the year 2000 rather casually,'' Brand says. ``It will haul off and bong twice on New Year's Eve.'' But not just with any old bong. The chime is being developed by avant-garde musician Brian Eno, whose ``Music for Airports" remains a classic of ambient music.

If it is built, people will come, Brand believes. ``We are looking at a number of desert mountain sites where you can tunnel through rock without shoring, a place with stable dry climates that will continue to be so for at least the next 1,000 years." At best, the clock will become a historical monument. At worst, the folly of a 60-year-old optimist and his posse.

The clock design is by supercomputer designer Daniel Hillis, now a fellow at Disney. Alexander Rose, 27, recently left the accelerated multimedia world to become executive director of the Long Now Foundation, created to ``foster long-term responsibility." Brand is president.

Rose knows fast and wants no part of it anymore. ``I was in multimedia, where we were always on a six-month burnout cycle on a project. We'd put out some CD-ROM that ended up a coaster in a week. My work was worthless the moment it came out. It wasn't satisfying."

Brand works part time without pay at the foundation offices, housed in an old wood-frame building in the Presidio. That is fitting. This protected place should last forever. He spends the rest of his time at the profitable Global Business Network, the consulting firm and think tank in Emeryville he founded a decade ago to train companies to project into the future.

Taking on the deep problems

It has been his life's mission to get others to see around corners. ``We tend to treat all problems
that can't be cured by the next election as not curable, but it takes more than that," Brand says. ``Civilization is 10,000 years old. If we figure we are in the middle, we have another 10,000 to work it out. For deep problems -- the rich and poor, population, hunger, war -- they are curable if you take your time."

The idea of creating the slowest computer ever -- now that's thinking ahead, Rose says. ``I think about the people who laid the first bricks for the Great Wall of China," says Rose. ``They knew they would never see it completed, but they also knew it would last way beyond their lifetimes."

At the moment, the foundation has a budget of $100,000. ``I pushed for getting donations online (www.longnow.org) right away," says Brand. ``Boy, was that a good idea."

None of the above means that Brand won't be caught up in millennium excitement on the big day. ``The three zeros coming up is a big deal. We'll all go crazy, get drunk, go home and wake up the next morning still drunk, and nothing works because of Y2K, and time goes on. This is about time going on, not about special moments in time."

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