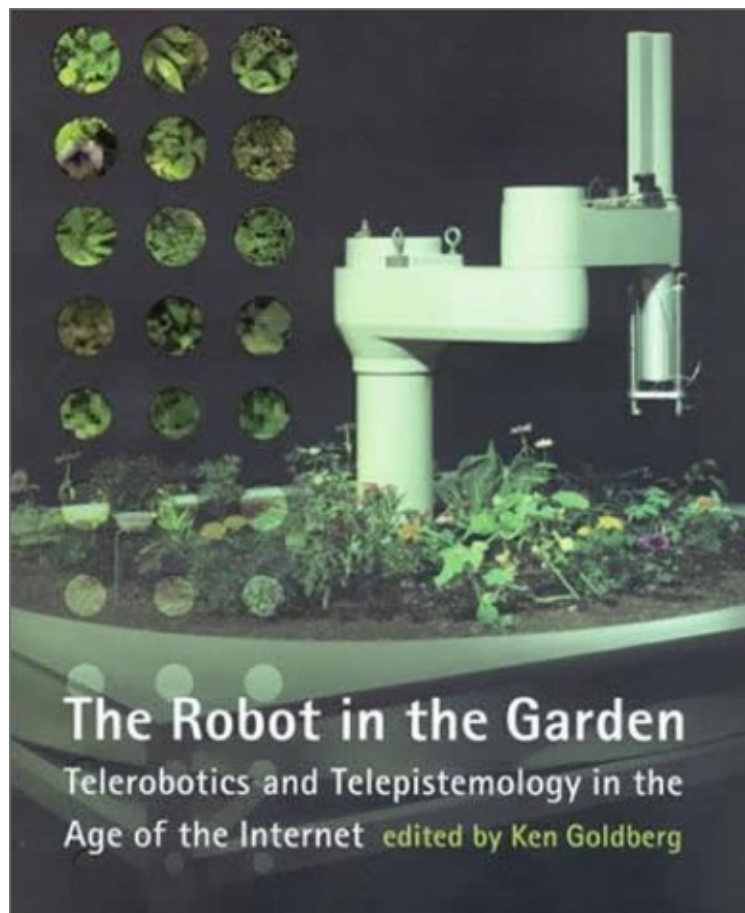


[Library ebook] The Robot in the Garden: Telerobotics and Telepistemology in the Age of the Internet (Leonardo Books)

The Robot in the Garden: Telerobotics and Telepistemology in the Age of the Internet (Leonardo Books)

Ken Goldberg

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#1903233 in Books 2001-10-01 Original language: English PDF # 1 9.00 x .75 x 7.00l, 1.38 #File Name: 0262571544392 pages | File size: 40.Mb

Ken Goldberg : The Robot in the Garden: Telerobotics and Telepistemology in the Age of the Internet (Leonardo Books) before purchasing it in order to gage whether or not it would be worth my time, and all praised The Robot in the Garden: Telerobotics and Telepistemology in the Age of the Internet (Leonardo Books):

1 of 2 people found the following review helpful. Personal Roving Presence devices ProPsBy Golden LionWebcams are a set of wired eyes giving expansion to our personal space and time envelope. The cyberspace of the net operates more or less independent of physical space, terrain, or geography and the built landscape meaning cyberspace attempts to symbolize reality in virtual. The "World Wide Web" provides inexpensive and ready access to a global computer network. Web cameras have are on interpretative aspect bridging the gulf between reality and virtual reality, mapping reality into cyberspace. People all over the world are able to keep in touch with everyone electronically. Goldberg says, "our mind expanding to all parts of the Universe", supposing the world to be produced by our mind, but how

does the mind justify reality? Descartes skepticism possesses the possibility of deception, stating, "since senses can malfunction, all information about the body and the external world is intrinsically unreliable." One thought is that reliability is established through rational justification. Epistemology attempts to determine how and to what extent our everyday beliefs about the world can be justified. Conventionally, philosophy abandoned Epistemology declaring there must be something wrong with the view that the mind as having only an indirect access to reality. Our basic relationship to reality is direct. Global skeptical doubts are incompatible with everyday experience. Humans are essentially a being (physical and spiritual) in the world, and assume roles of leadership. Cognition does not defined existence nor does the ability to mentally abstract. Without roles of leadership, morality, and law - chaos would clashes between spheres of intelligent agents. "I think therefore I am" is incomplete because it does not explain how humans make sense of everyday things and themselves and their relationship to other humans. Albert Borgman said, "the presentation of reality in cyberspace is shallow and discontinuous". Continuous experiences, connected meaning, and aesthetic value are critical themes for appreciating man existence. Goldberg believes that Epistemology will return in the age to protect against deception in the age of Virtual reality. Technology has been condemned as the spoiler of the garden and yet embraces, on the other hand, as necessary too getting back to nature. Technology distills or amplifies certain interpretative aspects of the natural world. Personal Roving Presence devices ProPs are simple, inexpensive, internet controlled, untethered tele-robots. ProPs do not exist in the virtual world, they exist in the physical world. ProP is an individual presence, and represents a unique remote participant. ProPs are cubist statues, with rearrangements of face and arms, and separation of eyes from gaze; they support gaze, proxemics (body location), gesture, posture, and dialogue. The controller or designer of ProPs discovers the importance of various sensing and action channels on higher behaviors by pulling switches and looking for change at the higher levels becoming students learning by decomposing social behaviors. The pilot is interacting with the control interface rather than people, however, if the human-machine coupling is tight enough, and if the pilot is expert at using the machine, the interface disappears. In 1995, remote web users were querying Mechanical Gaze, commanding its six degree-of-freedom robotic arm to browse and explore real remote artifacts and tangibles, at museums associate with UC Berkley. In 1996, Space Browsers when airborne and they consisted of a helium filled blimp with several light weight motors directly connected to propellers and onboard the blimp were a color video camera, microphone, speaker, simple electronics, and radio links. The design was small enough to allow navigation down narrow hallways, up stairwells, into elevators, and through doorways. Blimp behavior and appearance made them non-threatening and easily approachable. A user on the internet can pilot the blimp using a simple Java applet on the browser. Wireless signals transmitted to the blimp guide it up and down and left and right. The pilot observes the real world from the vantage of the blimp while listening to the sounds and conversations within its proximity and converse with groups and individuals by speaking into the microphone. Today's social machines are toys with computer cores and capabilities like touch sensing and speech. They can participate in reasonable complex interactive behaviors and are capable of situational activity. The toy response by touching by talking or playing encouraging the child to use touch to communicate, yet the toy can not hug back. Eventually toys will be able to hug back or be remotely controlled to hug back through remote control by a parent and be capable of generating familiar voice patterns. Tele-touch connects two simple touch sensors and haptic actuators together to create Datamitt. A participant in Los Angeles places his hand inside a tube and squeezes and a participant in New York will feel the pressure. The success of this simple inexpensive low-resolution device is promising. IRobot PackBot is used by the military to assist with Ordinance disposal. It has a robotic arm that can be remotely control reaching as far as 2 meters in any direction. It can traverse stairs, curbs, rubble, rocks, sand and mud. It has a high power rotating and pan zoom camera (300x) and a laser range finder to help size objects and determine position. 5 of 5 people found the following review helpful. Agency and Knowledge on the Internet Telepistemology By Arun Kumar The anthology of Prof. Ken Goldberg discusses the questions such as What is the essential relationship between distance and knowledge? How to technologies affect this relationship? How does technology alter our perceptions of distance and scale and our understanding of truth? What are the limits to the new technologies and how do they depend on existing human perceptual, cognitive and active capacities? How much can a human being change, even when equipped with an armory of telerobotic apparatus and how much can the concept of being human change?" "The Robot in the Garden: Telerobotics and Telepistemology on the Net" documents the projects and provokes thought with critical essays on its philosophical and cultural implications. The book is highly recommended to philosophers, media artists and robotics engineers.

An interdisciplinary collection of essays on telepistemology -- the study of knowledge acquired at a distance. The Robot in the Garden initiates a critical theory of telerobotics and introduces telepistemology, the study of knowledge acquired at a distance. Many of our most influential technologies, the telescope, telephone, and television, were developed to provide knowledge at a distance. Telerobots, remotely controlled robots, facilitate action at a distance. Specialists use telerobots to explore actively environments such as Mars, the Titanic, and Chernobyl. Military personnel increasingly employ reconnaissance drones and telerobotic missiles. At home, we have remote controls for the garage door, car alarm, and television (the latter a remote for the remote). The Internet dramatically extends our

scope and reach. Thousands of cameras and robots are now accessible online. Although the role of technical mediation has been of interest to philosophers since the seventeenth century, the Internet forces a reconsideration. As the public gains access to telerobotic instruments previously restricted to scientists and soldiers, questions of mediation, knowledge, and trust take on new significance for everyday life. Telerobotics is a mode of representation. But representations can misrepresent. If Orson Welles's "War of the Worlds" was the defining moment for radio, what will be the defining moment for the Internet? As artists have always been concerned with how representations provide us with knowledge, the book also looks at telerobotics' potential as an artistic medium. The seventeen essays, by leading figures in philosophy, art, history, and engineering, are organized into three sections: Philosophy; Art, History, and Critical Theory; and Engineering, Interface, and System Design. Contributors: Albert Borgmann, Tom Campanella, John Canny, Judith Donath, Hubert Dreyfus, Ken Goldberg, Alvin Goldman, Oliver Grau, Marina Grini, Blake Hannaford, Michael Idinopulos, Martin Jay, Eduardo Kac, Machiko Kusahara, Jeff Malpas, Lev Manovich, Maurice Merleau-Ponty, Eric Paulos, Catherine Wilson.

.com It may be trite to say that new technology changes the way we see ourselves and the world, but it's crucial that we explore those changes fully. In *The Robot in the Garden*, computer scientist Ken Goldberg curates a collection of essays on telerobotics by critics, philosophers, and engineers, addressing questions as fundamental as, "How does mediation affect the knowledge we acquire?" This book is a heady look at how remotely operated machines are affecting our beliefs and understanding of our interactions with each other and with the environment; while it's unlikely that every piece will interest every reader, anyone concerned with the future of art, technology, or society will find plenty to think about. Judith Donath, of MIT's Media Lab, asks how we define identity over the Internet and other electronic means of distant communication. Media art critic Machiko Kusahara reviews the current work of five telerobotic artists and their questioning of attitudes toward fundamental concepts like presence and absence. Philosopher Hubert L. Dreyfus cuts to the chase and examines knowledge itself in "Telepistemology: Descartes's Last Stand." Knowing that we know something is hard enough without miles of cables between our minds and the objects of our knowledge, but is technologically mediated information really different in kind? Eighteen essays in all contribute to the discussion of remote action. As we expand our bodies to include webcam eyes and robot arms, such questions become more and more important to thinking people, and we can start looking for answers with *The Robot in the Garden*. --Rob Lightner *The Robot in the Garden* brings together some of the most profound thinkers currently writing about such issues as telepresence, internet art, and the status of the real in a virtual age. Moreover, they frequently disagree with one another, an indication of the intellectual vitality of this work. Ken Goldberg's discussion of his pioneering work with robotic art sets the high standard that other distinguished contributors carry on, from Martin Jay to Eduardo Kac, Lev Manovich to Albert Borgmann. Don't miss out on this important collection. (N. Katherine Hayles, Professor of English, University of California, Los Angeles) About the Author Ken Goldberg is Associate Professor of Industrial Engineering and founder of the Art, Technology, and Culture Colloquium at the University of California, Berkeley. His Net art installations include "Dislocation of Intimacy," "Memento Mori," and "The Telegarden."