Abstract (225 words):

What James Moor famously described as “policy vacuums” due to the ICT-revolution have challenged our traditional ethical theories, and strained our conceptual resources. However, supplying philosophers with ethical challenges is not the only way in which computer science can be of assistance to the development of ethical theories. In this paper I will argue that terminology based on Object-Oriented Programming (OOP) can be of help when approaching ethical challenges – especially challenges within the field of Computer Ethics. This claim will be exemplified by trying to reinterpret the Kantian conception of indirect moral duty in OOP terms, in order to underline the importance of assessing the properties and functions of the objects we are acting towards. This focus on the properties of the objects we are acting through or towards, rather than the agent or action itself, is a furthering and defense of some central insights in the Information Ethics of Luciano Floridi, and the Disclosive Computer Ethics of Philip Brey. I will defend the thesis that choosing an informational level of abstraction framed in OOP terms, is important in order to avoid over-simplified assessments of Human-Computer Interaction. The central insight borrowed from Object-Oriented Programming is the way of dealing with problems by asking in what ways an information object can react to, modify and redirect messages received from a different Information Object.
Extended abstract (803 words):

What James Moor famously described as “policy vacuums” due to the ICT-revolution have challenged our traditional ethical theories, and strained our conceptual resources. However, supplying philosophers with ethical challenges is not the only way in which computer science can be of assistance to the development of ethical theories. In this paper I will argue that terminology based on Object-Oriented Programming (OOP) can be of help when approaching ethical challenges – especially challenges within the field of Computer Ethics.

This paper can be seen as a furthering and defense of, some central insights in the Information Ethics (IE) of Luciano Floridi1, and the Disclosive Computer Ethics (DCE) of Philip Brey2. Broadly speaking, my main thesis is that computer science is not only a source of ethical challenges, but also a source of valuable terminology in which to frame ethical theories. As Luciano Floridi – one of the pioneers in the philosophy of information and computing – has repeatedly stressed, choosing your level of abstraction is of the utmost importance when dealing with ethics. Building on Floridi’s Information Ethics and his use of OOP-terminology, I will argue that any ethical challenge that includes human-computer interaction (HCI) should be analyzed at the informational level of abstraction (LoA) and that borrowing insights and terminology from OOP is essential for coping with these challenges. Instead of framing our questions in terms of intentions, consequences or virtues, we should learn from OOP. When dealing with a problem in OOP, we ask ourselves “What are the properties of this object?”, “What messages is this object capable of transmitting?”, “What values or properties are embedded in this object?”, “What can the object do?”, “What can be done to the object?”, “How is this object related to other objects?”, “To which class does this object belong?”, “What properties are private and public?” and so on. Some of these questions are well known in traditional ethics (e.g. questions regarding classification) while others are novel (with the exception of IE and DCE) in the sense that they focus on the properties and abilities of the objects we are acting through or towards, rather than the

action itself or the agents performing it. This is especially important when dealing with HCI, because of the opaque and sometimes unintended mechanisms and biases embedded in computational devices. The point is also meant to emphasize the importance of interdisciplinary research and close collaboration between philosophers and computer scientists.

Too often, computer ethicists regard the computational system in question as a "black box" with predictable and humanlike qualities. Traditional ethical theories concentrate on an agent performing an action towards a patient, and to a large degree ignores the subtleties of the medium through which this action is mediated, as well as the way in which this action is redirected to non-intended targets. The impacts of an action mediated by computers are often unpredictable as long as our level of abstraction is focusing on the moral agent and patient. From an OOP-stance however, any medium through which we are sending a message might be transforming and reacting to that message, and any receiver of an action has various functions for propagating that message. Further, any information object has relations to other information objects. This underlines the importance of assessing how an action “indirectly” affects non-targeted information objects.

Although it can be argued that OOP is a fruitful approach to a number of problems in both human-human and human-computer interaction, I will limit myself to one important issue in this paper. The Kantian conception of indirect moral duty – in which our duty to treat a patient with respect is derived from something other than the patient – can be restated in OOP terms. By describing the receiver of an action in OOP terms, this conception can be reinterpreted in terms of the relations and functions embedded in that information object. This line of thought avoids some of the pitfalls of the Kantian approach, often criticized for being cynical and anthropocentric. By using this as an example of how OOP can be of use when facing ethical challenges, I will underline the importance of treating any receiver of an action as something that reacts to and transmits that action. I will also sketch in what way moral agents and patients could be understood as a network of interrelated information objects, and how this can help support claims regarding the relations between computer systems and human interests.