



# CRITICAL ALTERNATIVES IN COMPUTING SCHOLARSHIP

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*Coordinates of a Struggle to Go Beyond Capital*

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# COORDINATES OUTLINE

- ❖ 1<sup>st</sup> coordinate: Two tropes in computing narratives
- ❖ 2<sup>nd</sup>: The duality and space for a Leftist discourse on digital technologies
- ❖ 3<sup>rd</sup>: The Beyond Capital Project in brief
- ❖ 4<sup>th</sup>: An example of one value which the Project puts forward: a constructivist, critical perspective on technology design
- ❖ 5<sup>th</sup>: Constructivism and moving beyond Capital





## TROPES IN COMPUTING SCHOLARSHIP

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- ❖ The two narrative tropes in computing scholarship,
  - Norbert Wiener's socio-technical one ("recessive")
  - Claude Shannon's and Warren Weaver's technicist one ("dominant")
- ❖ Yet both implicated in actual computing development
- ❖ Hence, there is a gap between actual development and normal conceptualization; see, e.g., "openness"
- ❖ How dominant presumes capitalism and its reproduction as given



# A STRANGE DUALITY

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- ❖ Result: a strange duality, socially aware in practice, only engineeringly/corporately in theory
- ❖ Still, situation results in spaces for a domain of alternative critical scholarship, as in Participatory Design, Computer-Supported Cooperative Work, Critical Alternatives (Aarhus Conference)
- ❖ Also provides space for a critical technology politics that can also be leftist
- ❖ Leads to our project and our book, BEYOND CAPITAL: VALUES, COMMONS, COMPUTING, AND THE SEARCH FOR A VIABLE FUTURE (FORTHCOMING FALL, 2015, ROUTLEDGE)





# BEYOND CAPITAL PROJECT

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- ❖ Most generally, to foster a discourse on the dynamics of social formation reproduction desirable to emerge when those of capital become marginalized;
- ❖ Presumes either end of domination of these dynamics by capital or its terminal decline;
- ❖ Identifies the arenas of new values or values set, institutions for these values, and measures of institutionalizational success as things on which such discourse should focus;
- ❖ Finds in selected computing practices activities on which alternatives can be built.
- ❖ As Utopian, but not Utopian Socialist (Engels); and
- ❖ As seeing in computing a possibly revolutionary dynamic, but not a pathway to revolution.

# THE BEYOND CAPITAL VALUES

- ❖ As general values we extract from computing:
  1. Sustainability.
  2. Increased and broadened access to the means of cultural reproduction.
  3. Flexibility in the Scale of Social Formation Reproduction.
  4. A Broader understanding of “the economic.”
  5. A social constructivist perspective on technology.
  6. Democracy.
  
- ❖ As specific values relevant to face-to-face (or screen-to-screen) interaction:
  1. A Processual Approach or “Processuality.”
  2. Informating As the Basic Goal of Computing.
  3. A “Free Software” Approach to “Openness.”
  4. A Service-Orientation.
  5. Participation.





## A CONSTRUCTIVIST PERSPECTIVE ON, E.G., TECHNOLOGY DESIGN

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- ❖ To illustrate the Beyond Capital Project approach, focus on what we mean when we speak of the constructivist value, re: design
  - Stress co-construction of the social and the technical
  - Recognize need to stress the social, as technical generally over-represented
  - Technologies as actor networks (TAN)
  - As “society made durable”
  - Design as from somewhere, not “god view”
  - Infrastructuring, designing in regard to existing techs, as key
  - Actively mobilize all relevant constructions, including those of users
  - Referred to now as “public design” or “making things public”



## TAKING CONSTRUCTIVISM BEYOND CAPITAL

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- ❖ To take these understanding of design beyond capital:
  - Recognize how design is always contestable
  - Can start with concerns of people, not preoccupations of designers
  - Undermines “god-like,” “artistic vision” view of designer’s role
  - Rather, main designer role is a facilitator or broker
  - Implications for funding: will need to be open-ended, social reproduction-based; see “digital social innovation”:
    - “a type of social and collaborative innovation in which innovators, users and communities collaborate using digital technologies to co-create knowledge and solutions for a wide range of social needs and at a scale that was unimaginable before the rise of the Internet.” (EU DSI)



# CONCLUSION

- ❖ Constructivism as a value means articulating digital social innovation as public design infrastructuring; as innovation addressing societal issues without becoming subsumed to capital reproduction
- ❖ Also requires interdisciplinarity
- ❖ See as an example of how thinking beyond capital is both:
  - A guide to practice in the present (Gorz's non-reformist reform), and
  - A space for considering what we want of a future beyond capital
- ❖ General Project: to Foster such thinking