

## IEEE Agent Working Group Meeting (2013) Minutes

*Date:* Monday 22<sup>nd</sup> July, 2013

*Venue:* Renaissance Hotel, Room: Port of San Francisco

*Chair:* Nikos Hatziargyriou

### ***Minutes:***

- 1) Nikos Hatziargyriou provided information regarding the panel session titled “Multi Agent Systems Test Beds and Applications” at the current general meeting. He proposed to submit a transactions paper based on the panel presentations.
- 2) **Proposed Panel Session for PES GM 2014:** *Summary of Discussion:* It was decided that the next panel session needs to focus on the value and benefits of MAS, such that the wider PES GM community can become positive about their potential for delivering the autonomous and active applications that are desired. Specifically, we want to focus on deployed MAS, and cover the benefits and value of them alongside the lessons learnt during the deployment process and the future challenges. From this, we could draw out the key areas of research the MAS community within PES needs to focus on.

*Proposed Title:* Benefits and Challenges of Deploying Multi-Agent Systems

*Proposed Abstract:* Much of the IEEE PES activities and committees are focused on increasing the autonomy, automation and distribution of intelligent decision making and control throughout electric power systems. Multi-agent systems offer a flexible and scalable approach to designing and implementing such systems. This panel session will detail deployed multi-agent systems which are delivering automation and autonomous applications, which lie at the heart of the smart grid vision. The benefits and value of them will be described, alongside the longer term challenges. One of the outputs of this panel session is expected to be the determination of key areas of research the MAS community within PES needs to focus on.

*Chair:* Steve Widergren, PNNL

*Participants:* We need a focus group to decide on the people to invite. We don't want standard academic papers but more of a focus on actual use and deployment. Therefore, we would like industry participants (e.g. Siemens, S&C Electric) and a focus on key applications and key implementations. The WG members were invited to circulate the title and the abstract of the proposed Panel Session to their industry contacts asking them for participation in the Panel.

- 3) **Focus of MAS WG Activities:** There was a discussion around the focus of the MAS WG activities. It was felt that undertaking one or two focused activities would help the group. The following ideas arose:
  - IEEE P2030.4 Activities, as led by Dave Cartes. This activity in standardisation could become the focus of the MAS WG meetings, and there could be more regular web discussions to help.
  - Create a new IEEE Transactions paper detailing the key challenges and research areas within MAS for the PES community. This has been discussed for some time, so it may be worth putting together a small action group to discuss it and push this on. The discussions should help identify further MAS WG activities.

- Expanding the WG visibility and activities through participation in ISGT conference. Nikos Hatziargyriou will further investigate the possibility of having a panel/paper session related to MAS applications at ISGT conference.
  - Another possible activity that was mentioned was to conduct tutorials on MAS at a future IEEE PES GM.
- 4) **MAS WG Webpage:** The MAS WG pages on the IEEE website have not been updated. The TF on MAS for economics/markets wishes to put pages on the web – Ivana Kockar will coordinate this. An email should be sent around the MAS WG members asking them to review and suggest new material that should go on the web.
- 5) **Leigh Tesfatsion:** It was announced that Leigh Tesfatsion has decided to step down from being the co-chair of the TF on agent-based modeling of smart-grid market operations due to other commitments; however she will continue to participate as an active member of the MAS WG in other roles. The WG noted her contribution as TF co-chair and thanked her for her efforts.