Opening 802.3 Plenary Report
IEEE 802.3 Gigabit Ethernet over Plastic Optical Fiber Study Group

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GEPOF Study Group Charter
(per March 2014 motion)

Authorize formation of a Study Group to develop a Project Authorization Request (PAR) and Criteria for Standards Development (CSD) document for Gigabit Ethernet over Plastic Optical Fibre.
Reflector and web

• To subscribe to the GEPOF reflector, send an email to: 
  \texttt{ListServ@ieee.org} 
  with the following in the body of the message (do not include “<>”):

\begin{verbatim}
subscribe stds-802-3-GEPOF <yourfirstname>
   <yourlastname>
end
\end{verbatim}

• Send GEPOF reflector messages to: 
  \texttt{stds-802-3-GEPOF@listserv.ieee.org}

• Study Group web page URL: 
  \texttt{http://www.ieee802.org/3/GEPOFSG/index.html}
Activities since March 2014

• GEPOF study group meeting in Norfolk, VA, USA (thanks to our host, the Ethernet Alliance)
  – Technical presentations covered transmitter, receiver, cabling and channel
  – Market potential and requirements presentations for both home networking and automotive
  – Approved PAR, CSD and Objectives

• Project documents submitted to IEEE 802 and NesCom
Objectives

- Preserve the IEEE 802.3/Ethernet frame format utilizing the IEEE 802.3 MAC
- Preserve minimum and maximum frame size of the current IEEE 802.3 standard
- Support full duplex operation only
- Support a data rate of 1000 Mb/s at the MAC/PLS service interface
- For the automotive environment:
  - Specify operation over at least 15m of POF with 4 in-line connectors
  - Specify operation over at least 40m of POF with no in-line connectors
- For the home and industrial environment specify operation over at least 50m of POF with 1 in-line connector
- Maintain a bit error ratio (BER) better than or equal to $10^{-12}$ at the MAC/PLS service interface
- Specify optional Energy-Efficient Ethernet for 1000 Mb/s over POF
Goals for this week

• Address comments on the PAR and CSD
• Seek working group approval of PAR, CSD and Objectives
• Study Group presentations and discussions
  – Technical solution possibilities
    • Possible solutions for PCS and PMA
  – Market potential and requirements
    • Requirements for automotive applications
    • Reinforcement of broad market potential
    • Energy consumption and emissions
  – Planning in anticipation of project approval
Thank You!