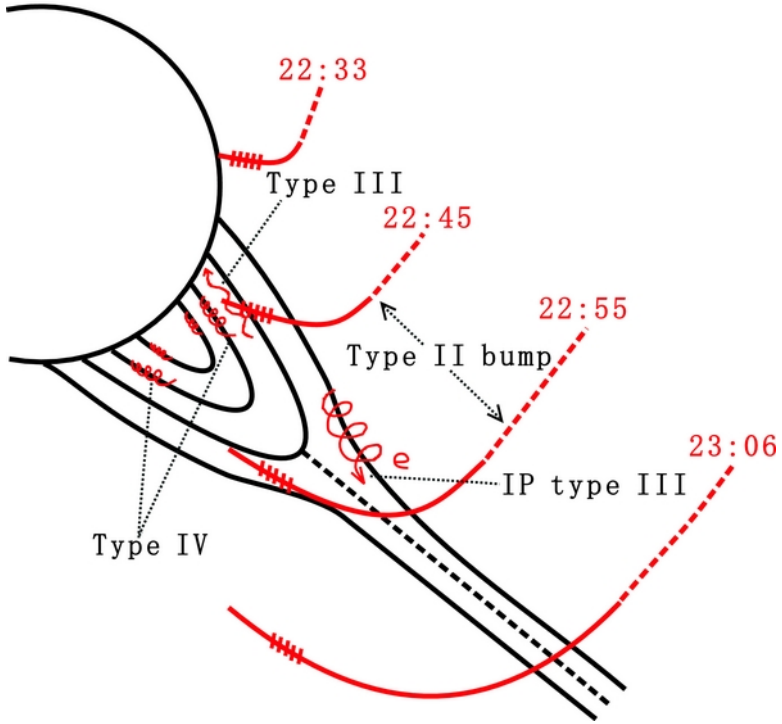
(2) Shock formation in the solar atmosphere

By comparing the radio dynamic spectrum and the white-light coronagraph observations, clear evidence is presented to demonstrate that the spectral bump in the type II radio burst is due to the CME-driven shock entering the dense streamer structure.

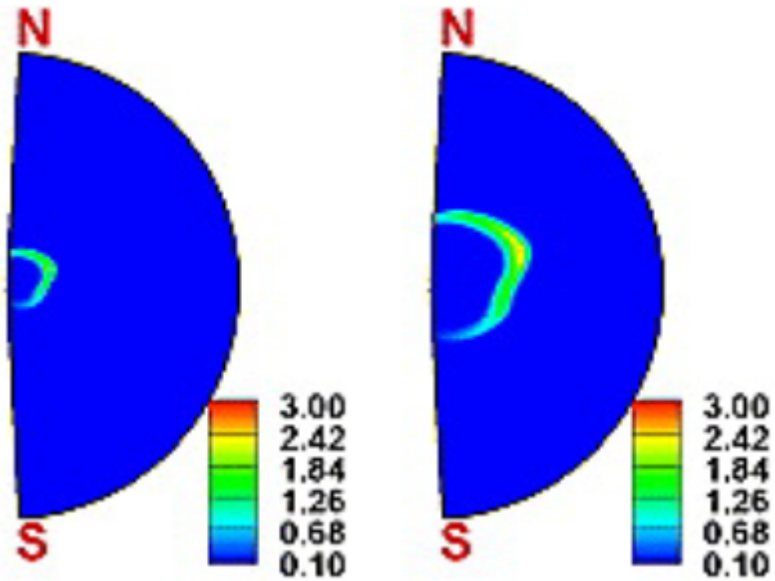
Feng, S. W.; Chen, Y.; Kong, X. L. et al. 2012, ApJ, 753, 21

Shen, Chenglong; Liao, Chijian; Wang, Yuming et al. 2013, Solar Phys., 282, 543



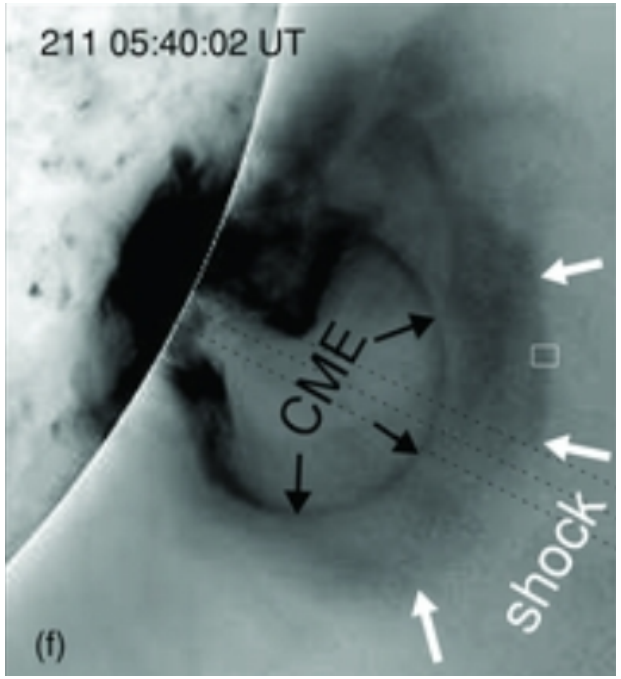
3D MHD numerical simulations have been performed, which successfully explained the dynamics of several CMEs and the associated shock waves.

Shen, F.; Feng, X. S.; Wu, S. T.; Xiang, C. Q.; Song, W. B. 2011, JGR, 116, A4102



A dome-like shock wave is clearly observed in EUV images observed by SDO/AIA. The results strongly support the view that the coronal shock wave is driven by the CME bubble.

Ma, Suli; Raymond, John C.; Golub, L. et al. 2011, ApJ, 738, 160



For the first time it is identified that associated with a CME there is a shock wave ahead of the classical "EIT wave" in EUV images, presenting strong evidence that "EIT wave" is not the coronal Moreton wave.

Chen, P. F. & Wu, Y. 2011, ApJ, 732, L20

Asai, A. et al. 2012, ApJ, 745, L18