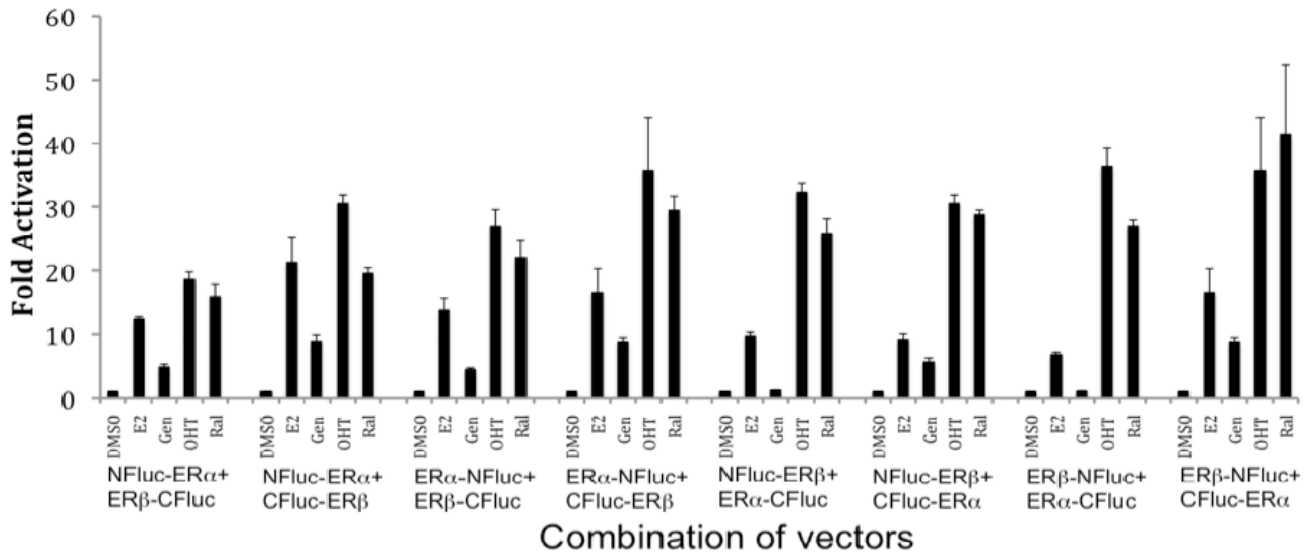
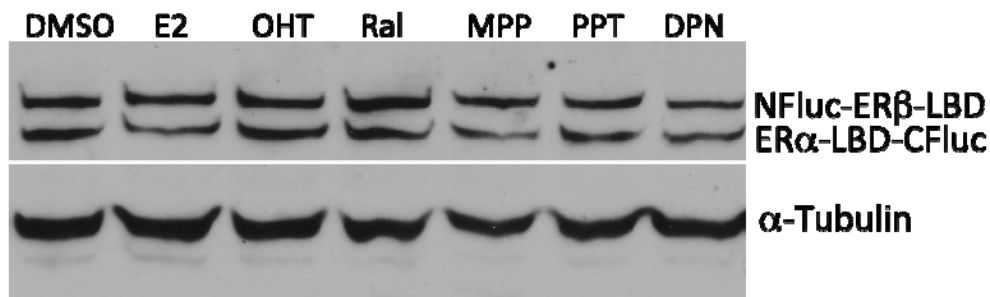


Supplemental Figures:



Supplemental Figure 1. The ligand induced ER α / β heterodimerization studied in HEK293T cells co-transfected with the vectors expressing the fusion proteins in all possible combinations to identify the orientation of ER-LBD with the split luciferase fragments that led to most efficient luciferase complementation. The combination of vectors expressing NFluc-ER β and the ER α -CFluc showed a slightly higher level of complementation that can differentiate ligands based on their biocharacters.



Supplemental Figure 2. Western blot analysis of HEK293T cells co-transfected with vectors expressing ER α / β heterodimerization system (NFluc-ER β and ER α -CFluc)

evaluated for the expression levels of fusion proteins before and after exposure to different ER ligands using anti-Fluc antibody. The results found no variation in the expressed levels of fusion proteins in response to different ligands.