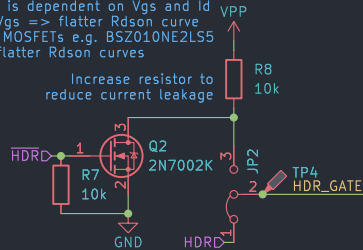


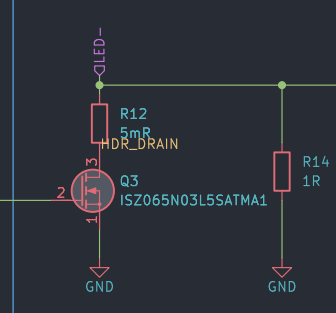
HDR Gate Drive

Rdson is dependent on Vgs and Id
High Vgs => flatter Rdson curve
Some MOSFETs e.g. BSZ010NE2LS5
have flatter Rdson curves

Increase resistor to
reduce current leakage

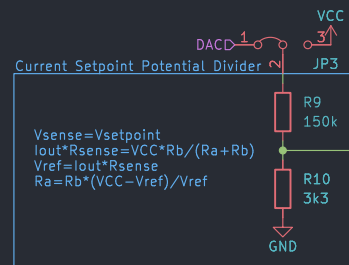


Current Sense Resistors

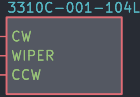


Current Setpoint Potential Divider

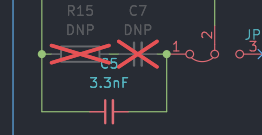
$V_{sense} = V_{setpoint}$
 $I_{out} * R_{sense} = VCC * R_b / (R_a + R_b)$
 $V_{ref} = I_{out} * R_{sense}$
 $R_a = R_b * (VCC - V_{ref}) / V_{ref}$

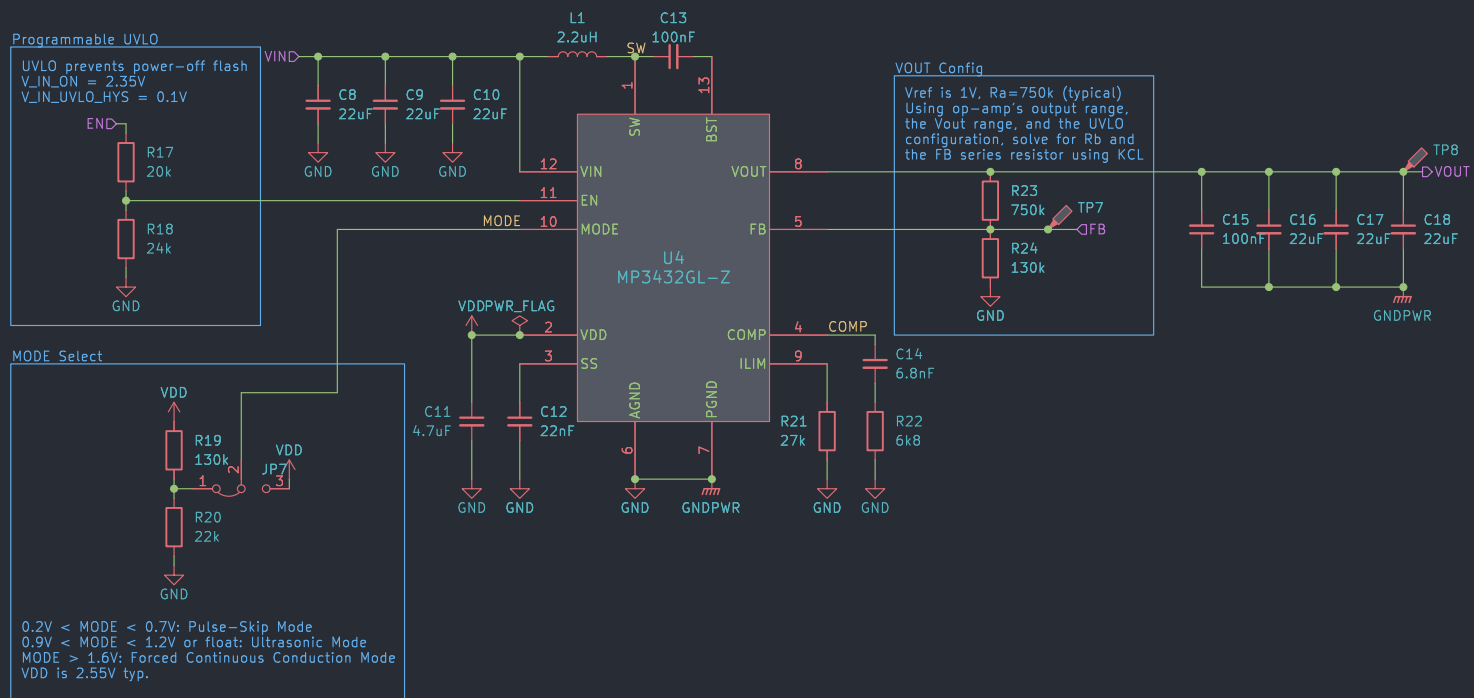


VR1
3310C-001-104L



Op-Amp Frequency Compensation





Engineer Bo (<https://www.youtube.com/@engineerbo>)

Sheet: /MP3432/

File: mp3432.kicad_sch

Title: Boost Driver Dev. Board

Size: A4

Date: 2024-03-13

KiCad E.D.A. 8.0.1

Rev: B

Id: 4/4