

# RF2P-ULL-GF22FDX-PLUS

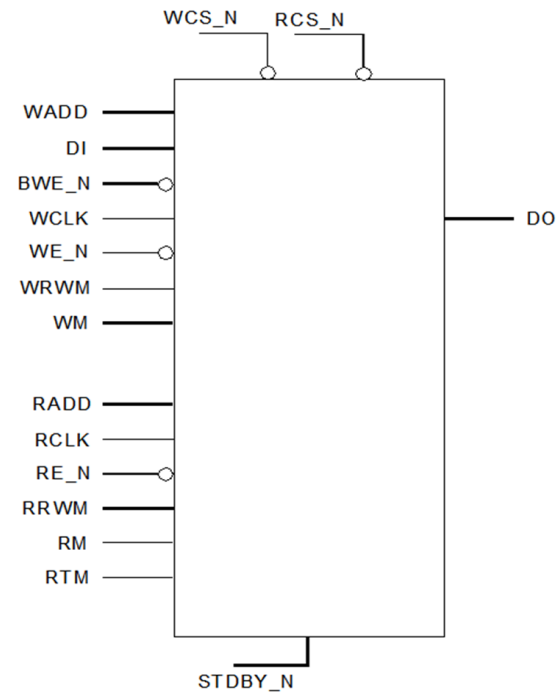
## Dual Port Register File Compiler

(1 Read-only port, 1 Write-only port)

### Highlights

- Uses 8T-TP185SL bit cells.
- Isolated Supplies: Periphery and array power domains can be independently powered down in standby mode.
- Deep Sleep Standby Mode: Memory retains data at minimal power via internal biasing.
- Timing Margin Controls: Internal pins separately adjust read and write timing margins.
- Integrated BIST Mux for Built-In Self Test support.
- Speed vs Leakage Tradeoff Option


### Technology & Specs



<b>Technology</b>	22FDX-PLUS	<b>Max Instance</b>	32Kb	<b>EDA Views (Partial List)</b>	
<b>Voltage</b>	0.8V (0.72V to 0.88V)	<b>Min Instance</b>	128b	Verilog Model with UPF	
<b>Temperature</b>	-40°C to +125°C	<b>Word Width</b>	4-64	Liberty Files (NLDM, LVF, CCS)	
<b>Power</b>	Mesh	<b>Word Depth</b>	16-1024	PDF and Text Datasheets	Redhawk APL
<b># Metal Layers</b>	4	<b>Aspect Ratio</b>	Column Fold: 4 or 8	LEF 5.8	Verilog Test Bench
<b>BIST Mux</b>	Internal	<b>User Interface</b>	Command line	LVS SPICE Netlist	Bitmap File (x, y)
<b>Modes</b>	Functional, BIST, Scan, Sleep	<b>Bit Write Enable</b>	Optional	GDS	Power Grid (Votus)
				Tessent MBIST Control File	Common Power Format (CPF)

### About Mobile Semiconductor

Nordic Semiconductor's Seattle memory team (formerly Mobile Semiconductor) provides SRAM, ROM, and Register File compilers optimized for ultra-low power, leakage, and high-performance applications.

 [www.mobile-semiconductor.com](http://www.mobile-semiconductor.com)

© April 2025 Nordic Semiconductor. All rights reserved.