Operation	Operator VHDL	Operator Verilog
Arithmetic Operators		
exponential	**	
multiplication	*	*
division	/	/
addition	+	+
subtraction	-	-
modulus	mod	%
remainder	rem	
absolute value	abs	
Unary Arithmetic (Sign) Operators		
identity	+	+
negation	-	-
Relational Operators		
less than	<	<
less than or equal to	<=	<=
greater than	>	>
greater than or equal to	>=	>=
Equality Operators		
equality	=	==
inequality	/=	!=
Logical Comparison Operators		
NOT	not	!
AND	and	&&
OR	or	||
Logical Bit-wise Operators		
unary negation NOT	not	~
binary AND	and	&
binary OR	or	|
binary nAND	nand	
binary NOR	nor	
binary XOR	xor	^
binary XNOR	xnor	^~ or ~^
Shift Operators		
logical shift left	sll	<<
logical shift right	srl	>>
arithmetic shift left	sla	<<<
arithmetic shift right	sra	>>>
logical rotate left	rol	
logical rotate right	ror	
Concatenation & Replication Operators		
concatenation	&	{ }
replication		{{ }}
Reduction Operators		
AND		&
OR		|
NAND		~&
NOR		~|
XOR		^
XNOR		^~ or ~^
Conditional Operator		
conditional		? :