

Rock-Forming Minerals to memorize for Mineral Quiz I

Mineral	Structural Formula	Oxide formula	Silicate class
Forsterite end-member of olivine SS	$\text{Mg}_2[\text{SiO}_4]$	$2\text{MgO} * \text{SiO}_2$	Nesosilicate
Fayalite end-member of olivine SS	$\text{Fe}_2[\text{SiO}_4]$	$2\text{FeO} * \text{SiO}_2$	Nesosilicate
Olivine solid solution	$(\text{Fe,Mg})_2[\text{SiO}_4]$	$2(\text{Fe, Mg})\text{O} * \text{SiO}_2$	Nesosilicate
Enstatite end-member of Orthopyroxene Solid Solution	$\text{Mg}[\text{SiO}_3]$ or $\text{Mg}_2[\text{Si}_2\text{O}_6]$	$\text{MgO} * \text{SiO}_2$	Pyroxene group of Inosilicates, or Chain silicate
Diopside end-member of clinopyroxene SS	$\text{CaMg}[\text{Si}_2\text{O}_6]$	$\text{CaO} * \text{MgO} * 2\text{SiO}_2$	Pyroxene group of Inosilicates, or Chain silicate
Hedenbergite end-member of clinopyroxene SS	$\text{CaFe}[\text{Si}_2\text{O}_6]$	$\text{CaO} * \text{FeO} * 2\text{SiO}_2$	Pyroxene group of Inosilicates, or Chain silicate
Clinopyroxene solid solution	$\text{Ca}(\text{Mg,Fe})[\text{SiO}_3]_2$	$\text{CaO} * (\text{Mg,Fe})\text{O} * \text{SiO}_2$	Pyroxene group of Inosilicates, or Chain silicate
Augite -Na- and Al-bearing clinopyroxene solid solution	$(\text{Na, Ca}) (\text{Mg,Fe, Al})[(\text{Al,Si})\text{O}_3]_2$		Pyroxene group of Inosilicates, or Chain silicate
Albite end-member of plagioclase SS	$\text{Na}[\text{AlSi}_3\text{O}_8]$	$\text{Na}_2\text{O} * \text{Al}_2\text{O}_3 * 6\text{SiO}_2$	Feldspar group of tectosilicates or Framework silicate
Anorthite end-member of plagioclase SS	$\text{Ca}[\text{Al}_2\text{Si}_2\text{O}_8]$	$\text{CaO} * \text{Al}_2\text{O}_3 * 2\text{SiO}_2$	Feldspar group of tectosilicates or Framework silicate
Plagioclase solid solution	$(\text{Na,Ca})[(\text{AlSi})_4\text{O}_8]$		Feldspar group of tectosilicates or Framework silicate
Quartz	SiO_2	SiO_2	Tectosilicate or Framework silicate
Nepheline	$\text{Na}[\text{AlSiO}_4]$	$\text{Na}_2\text{O} * \text{Al}_2\text{O}_3 * 2\text{SiO}_2$	Feldspathoid group of tectosilicates or Framework silicate