Monoclinic crystals of (5MAP)$_2$Cu$_2$Cl$_6$ where 5MAP is the 5-methyl-2-aminopyridinium ion have cell dimensions $a = 3.917 \AA$, $b = 24.07 \AA$, $c = 12.18 \AA$, $\beta = 104.14^\circ$; $P2_1/c$, $Z=2$. Twinning causes the twin components of $h,k,l$ to be related by $h=2n+1$ and $a^*=0.75c^*$ while $h=2n+l$ data is resolved. Mounting a crystal so that $h=2n+l$ data to partially overlap, while $h=2n+l$ data is resolved. Mounting a crystal so that $h=2n+l$ data to partially overlap, while $h=2n+1$ data is resolved. A 4mm high slit at a distance of 173mm implied an angle of $\theta = 0.75^\circ$ and $\phi = 0.36^\circ$ to describe the shift in four circule diffraction angles necessary to locate the twin related reflections without harming the ultimate refinement. The probability that $s$ points chosen at random on a three dimensional lattice satisfy the primitivity condition is $\frac{(1/a^2 + 1/b^2 + 1/c^2)^2}{(1/a^2 + 1/b^2 + 1/c^2 - 1)^2}$, where $c$ is the Raman theta function. Applied to the reciprocal lattice, this provides a method of estimating whether, for example, such a non-primitive arrangement of strong reflections could occur by chance or represents a genuine case of rational dependence, or of a commensurate superlattice. However, when considering potential superlattices in practice, only those belonging to the same Laue class are of any interest, in which case the formula above only holds for Laue class 1, i.e. the triclinic space groups P1 and P1. For all other space groups, we must consider the effect of choosing a points at random together with all the other points related to them through the diffraction symmetry. There are then 24 cases in all, since the expression will be identical for space groups belonging to the same "Patterson symmetry", that is the same Laue classes, and lattice type. These expressions have been derived, and their form in all cases was found to be $A(s)/f(s)$ where $f$ depends only on the Laue class, and is a product of the sums of infinite series, chiefly theta functions, but also Dirichlet L functions. A in turn derives from the lattice type, but varies depending on what other lattice types exist in that Laue class, and are therefore available as potential superlattices. It represents a correction to one prime number (p) term in the infinite product form of f(s), the term adjusted being the $p-2$ term in the monoclinic, orthorhombic, tetragonal and cubic crystal classes, and the $p-3$ term in the trigonal and hexagonal classes. The various formulæ have been evaluated for appropriate values of $s$ and some examples of their application will be given.