(1) (i) $\sin A$

$= \sqrt{\sin^2 A}$

$= \sqrt{\frac{1}{\operatorname{cosec}^2 A}}$

$= \sqrt{\frac{1}{1+\cot^2 A}}$

(ii) $\sec A$

$= \sqrt{\sec^2 A}$

$= \sqrt{1+\tan^2 A}$

$= \sqrt{1+\frac{1}{\cot^2 A}}$

$= \sqrt{\frac{1+\cot^2 A}{\cot^2 A}}$

(iii) $\tan A$

$= \frac{1}{\cot A}$

2 (v) $\tan A$

$= \sqrt{\tan^2 A}$

$= \sqrt{\sec^2 A - 1}$

(2) (i) $\sin A$

$= \sqrt{\sin^2 A}$

$= \sqrt{1-\cos^2 A}$

$= \sqrt{1-\frac{1}{\sec^2 A}}$

$= \sqrt{\frac{\sec^2 A - 1}{\sec^2 A}}$

(ii) $\cos A$

$= \frac{1}{\sec A}$

(iii) $\operatorname{cosec} A$

$= \sqrt{\operatorname{cosec}^2 A}$

$= \sqrt{\frac{1}{\sin^2 A}}$

$= \sqrt{\frac{1}{1-\cos^2 A}}$

$= \sqrt{\frac{1}{1-\frac{1}{\sec^2 A}}}$

$= \sqrt{\frac{\sec^2 A}{\sec^2 A - 1}}$

(iv) $\cot A$

$= \frac{1}{\tan A}$

$= \frac{1}{\sqrt{\tan^2 A}}$

$= \frac{1}{\sqrt{\sec^2 A - 1}}$