

Table 1. Imaging modalities for assessing coronary calcium

| | CT | ICA | IVUS | OCT |
|-------------------------------|--|--|---|--|
| Overall sensitivity | ++ | + | +++ | +++ |
| Circumferential arc | ++ | - | +++ | +++ |
| Depth / thickness | + | + | + | +++ |
| Longitudinal extension | ++ | + | +++ | +++ |
| Non-invasiveness | +++ | + | - | - |
| Specific advantages | Useful for preprocedural planning of CT | Standard study (availability) | Guidance for calcium-directed therapies | Guidance for calcium-directed therapies |
| Specific disadvantages | Additional contrast and radiation. Blooming artefact may over estimate calcium extent | Definition affected by body mass. Calcium often underestimated. | Calcium thickness can be challenging to assess. | Additional contrast required. Coronary ostia challenging to assess. |

Legend. Summary of sensitivity of available imaging modalities for the assessment of coronary calcium and their specific advantages and disadvantages.

Table 2. Comparison of Outcomes of Adjunctive Technologies

| Technology | Procedural Success | Dissection | Perforation | Slow Reflow | MACE | TVR | Specific Considerations |
|-------------------------------|--------------------|------------|-------------|-------------|----------------------------|----------------------------|-------------------------|
| RA ⁵⁹⁻⁶⁷ | 92.5-100% | 1.7-5.9% | 0.5-2.0% | 0-2.6% | 6-30.1% (6-49 months) | 2.8-35.7% (6-49 months) | - |
| OA ^{74 76 77} | 97.7-98% | 0.7-12% | 0.7-1.8% | 0-0.7% | 1.7-16.4% (1-12 months) | 0.7% (12 months) | - |
| LA ^{92 93 94} | 77.2% | 4.3-6.9% | 1.3-1.7% | - | 4.3-36.8% (12 months) | 46% (12 months) | Thermal overheating |
| IVL ^{95 96} | 95% | 0% | 0% | 0% | 5% (6 months) | 0% (6 months) | - |

Legend. Summary of complications and outcomes of adjunctive calcium modification technologies.

Table 3. Comparison of Characteristics of Adjunctive Therapies for Calcium Modification

| Technology | Compatibility | Guidewire | Ease of Use | Superficial Ca+ | Deep Ca+ | Fibro-calcific | Ca+ Nodule | Crossability |
|------------|---|-----------|-------------|-----------------|----------|----------------|------------|--------------|
| RA | 6 Fr. 1.25-1.5mm 7Fr. 1.75-2.0mm | Rotawire | - | +++ | - | + | + | +++ |
| OA | 6 Fr. | Viperwire | - | +++ | ++ | + | ++ | + |
| LA | 7 Fr. | Any | ++ | ++ | + | +++ | - | + |
| IVL | 6 Fr. | Any | +++ | +++ | +++ | + | + | + |

Legend. Summary of characteristics and procedural considerations of adjunctive therapies for calcium modification