

**Supplementary Table 1.** Direct comparison of the 2023 update and the 2018 original recommendations on the use of imaging in large vessel vasculitis

2023 update	2018 original
<b>Overarching principles</b>	<b>Recommendations</b>
A. In patients with suspected GCA, an early imaging test is recommended to support the clinical <b>diagnosis</b> of GCA, assuming high expertise and prompt availability of the imaging technique. Imaging should not delay initiation of treatment.	1. In patients with suspected GCA, an early imaging test is recommended to <del>complement the clinical criteria for diagnosing</del> GCA, assuming high expertise and prompt availability of the imaging technique. Imaging should not delay initiation of treatment.
B. Imaging examination should be done by a trained specialist using appropriate equipment, <b>standardized</b> operational procedures and settings.	12. Imaging examination should be done by a trained specialist using appropriate equipment, operational procedures and settings. <del>The reliability of imaging, which has often been a concern, can be improved by specific training. Suggestions for technical and operational parameters are depicted in Box 1.</del>
C. In patients in whom there is a high clinical suspicion of GCA and a positive imaging <b>result</b> , the diagnosis of GCA may be made without an additional test (biopsy or further imaging). In patients with a low clinical probability and a negative imaging result, the diagnosis of GCA can be considered unlikely. In all other situations ( <b>including the case of an inconclusive imaging result</b> ), additional efforts towards a diagnosis are necessary.	2. In patients in whom there is a high clinical suspicion of GCA and a positive imaging <del>test</del> , the diagnosis of GCA may be made without an additional test (biopsy or further imaging). In patients with a low clinical probability and a negative imaging result, the diagnosis of GCA can be considered unlikely. In all other situations, additional efforts towards a diagnosis are necessary.
<b>Recommendations</b>	
1. Ultrasound of temporal <b>and</b> axillary arteries <b>should be considered</b> as the first imaging modality <b>to investigate mural inflammatory changes</b> in patients with suspected GCA.	3. Ultrasound of temporal $\pm$ axillary arteries <del>is recommended as the first imaging modality in patients with suspected predominantly cranial GCA. A non-compressible 'halo' sign is the ultrasound finding most suggestive of GCA.</del>
2. High resolution MRI <b>or FDG-PET can</b> be used as alternatives <b>to ultrasound for the assessment</b> of cranial arteries $\neq$ <b>in patients with suspected GCA.</b>	4. High resolution MRI of cranial arteries <del>to investigate mural inflammation</del> may be used as an alternative for GCA diagnosis <del>if ultrasound is not available or inconclusive.</del>

	5. <del>CT<sup>†</sup> and PET<sup>†</sup> are not recommended for the assessment of inflammation of cranial arteries.</del>
3. FDG-PET <sup>†</sup> , <b>alternatively</b> MRI or CT, <b>can</b> be used for the detection of mural inflammation or luminal changes <b>of</b> extracranial arteries <b>in patients with suspected GCA.</b>	6. <del>Ultrasound, PET, MRI and/or CT may be used for detection of mural inflammation and/or luminal changes in extracranial arteries to support the diagnosis of LV-GCA. Ultrasound is of limited value for assessment of aortitis.</del>
4. In patients with suspected TAK, MRI to investigate mural inflammation or luminal changes should be used as the first imaging test to make a diagnosis of TAK.	7. In patients with suspected TAK, MRI to investigate mural inflammation <b>and/or</b> luminal changes should be used as the first imaging test to make a diagnosis of TAK, <del>assuming high expertise and prompt availability of the technique.</del>
5. FDG-PET, CT or ultrasound may be used as alternative imaging modalities in patients with suspected TAK. Ultrasound is of limited value for assessment of the thoracic aorta.	8. PET, CT and/or ultrasound may be used as alternative imaging modalities in patients with suspected TAK. Ultrasound is of limited value for assessment of the thoracic aorta.
6. Conventional angiography is not recommended for the diagnosis of GCA or TAK as it has been superseded by the previously mentioned imaging modalities.	9. Conventional angiography is not recommended for the diagnosis of GCA or TAK as it has been superseded by the previously mentioned imaging modalities.
7. <b>In case of a suspected relapse of GCA or TAK, particularly when laboratory markers of disease activity are unreliable, ultrasound, FDG-PET or alternatively MRI may be considered for the assessment of vessel abnormalities.</b> Imaging is not routinely recommended for patients in clinical and biochemical remission.	10. <del>In patients with LVV (GCA or TAK) in whom a flare is suspected, imaging might be helpful to confirm or exclude it. Imaging is not routinely recommended for patients in clinical and biochemical remission.</del>
8. In patients with <b>GCA or TAK</b> , MRA, CTA or ultrasound of extracranial vessels may be used for long-term monitoring of structural damage, <b>particularly at sites of preceding vascular inflammation.</b> The frequency of screening as well as the imaging method applied should be decided on an individual basis.	11. In patients with <del>LVV (GCA or TAK)</del> , MRA, CTA <b>and/or</b> ultrasound may be used for long-term monitoring of structural damage, <del>particularly to detect stenosis, occlusion, dilatation and/or aneurysms.</del> The frequency of screening as well as the imaging method applied should be decided on an individual basis.

Red font indicates new formulations

CT, computed tomography; GCA, giant cell arteritis; LV-GCA, large vessel GCA; LVV, large vessel vasculitis; MRI, magnetic resonance imaging; PET, [18F]-fluorodeoxyglucose positron emission tomography; TAK, Takayasu arteritis