past decade or so, highly active antiretroviral therapy (HAART) has improved the immune function and life expectancy in HIV-infected patients. In a small study, Iemoli et al[94] evaluated the safety and effectiveness of 1 year of therapy with SLIT-Tablet (SLIT-T) in a group of grass pollen-allergic HAART-treated HIV-positive patients (n = 13). Compared to controls, the SLIT-T-treated patients had significant improvement in symptoms, medication scores, and QOL. HIV viral load and peripheral CD4 T lymphocyte counts were also monitored and did not show significant change after treatment compared to baseline. There are 3 additional case reports in the literature that describe immunotherapy in patients with HIV, and all show clinical improvement in allergic symptoms. In one, a patient received immunotherapy for several years without a change in CD4 or HIV viral load,[95] and in the other,[96] the patient showed a transient rise in viral load and CD4 counts while on SCIT which returned to a stable baseline with ongoing HAART therapy. In 2021, Latysheva et al[97] treated 2 HIV-positive patients with birch tablet immunotherapy with no obvious side effects, but CD4 counts and viral loads were not monitored. The decision to pursue AIT in HIV-positive patients should be made after the risks and evidence are discussed with them.

Clinicians May Choose Not to Initiate SLIT for Patients With EoE

There are 3 case reports in the literature from Europe and Japan about the onset of EoE after initiation of SLIT. In 2 cases, this was after therapy with the tablet form[98,99] and the third case was with SLIT-Aq.[100] The prescribing information of the FDA-approved SLIT tablets currently available in the US lists a history of EoE as a contraindication to use. The rationale is that exposure of the esophageal mucosa to allergens in predisposed individuals could precipitate esophageal eosinophilic infiltration. This is supported by evidence in the literature which shows a seasonal prevalence of EoE[101] and a high prevalence of eosinophil infiltration of the esophagus in allergic patients in season.[102] Therefore, clinicians should not offer SLIT for patients with EoE but could still offer treatment with SCIT.

Statement 3: Asthma Assessment

Clinicians should evaluate the patient or refer the patient to a clinician who can evaluate for signs and symptoms of asthma before initiating AIT and for signs and symptoms of uncontrolled asthma before administering subsequent AIT.

Evidence Strength: Recommendation based on RCTs, CPGs, and systematic review of observational studies with a preponderance of benefit over harm.

Action Statement Profile: 3

- Quality improvement opportunity: Avoid the potential for severe systemic adverse events and the higher risk of fatality if AIT is administered (or continued) in the presence of uncontrolled asthma; decrease variability in practice if there are clinicians who do not routinely assess for uncontrolled asthma before administering AIT
  (National Quality Strategy Domains: Patient Safety, Coordination of Care, Prevention and Treatment of Leading Causes of Morbidity and Mortality)
- Aggregate evidence quality: Grade B, based on systematic review of RCTs, observational studies, and CPGs
- Level of confidence in the evidence: High
- Benefits: Improve outcomes through identifying patients potentially at risk; prevention of morbidity and mortality; facilitate further care
- Risks, harms, costs: No risks or harms; potential increase of cost and time, emotional stress, and use of resources in determining asthma diagnosis
- Benefits-harm assessment: Preponderance of benefit over harm
- Value judgments: Not all clinicians assess asthma prior to initiation of or during AIT
- Intentional vagueness: Not defining "assessment" in the statement but supporting text does include information about patient-reported, subjective assessment and means for objective assessment
- Role of patient preferences: None
- Exceptions: None
- Policy level: Recommendation
- Differences of opinion: None

Supporting Text

The purpose of this statement is to recommend that clinicians evaluate patients for asthma status prior to initiating AIT and assess asthma control when administering AIT to patients with co-existing asthma. Data support a positive impact of AIT on asthma outcomes and QOL in patients with mild to moderate disease.[103-109] Although there are studies demonstrating safety and tolerance of AIT in children and adults with asthma,[110,111] caution is recommended in AR/ARC patients receiving AIT who have co-morbid asthma. Asthma, especially severe asthma, is a major risk factor for severe and fatal SRs. Strategies to reduce risks with individuals with comorbid asthma may lower these risks.[63,83,112]

Severe asthma has been defined by the Global Initiative for Asthma (GINA) 2023 as asthma that is uncontrolled despite adherence with optimized high-dose ICS-long-acting beta agonist therapy and treatment of contributory factors or that worsens when high-dose treatment is decreased.[113] While there is no universal definition of uncontrolled asthma, the general consensus is that uncontrolled asthma includes poor symptom control and/or frequent exacerbations requiring oral corticosteroids or hospitalization.[63,114-117] Uncontrolled asthma has been associated with SRs to SCIT, increasing morbidity and mortality; therefore, assessment of asthma