

# AquADEKs-2: Effects of an antioxidant-enriched multivitamin on inflammation and oxidative stress in people with CF (AquADEKs-IP-12)

## Summary

This study evaluated the effects of an antioxidant-enriched multivitamin supplement on inflammation. This study was for people with CF who are pancreatic insufficient.

Participants were randomized to receive an antioxidant-enriched multivitamin (AquADEKS-2 group) or a control multivitamin without antioxidant enrichment for 16 weeks of treatment.

## Specimen Information

### Status: Specimens are Available

The purpose of this randomized, controlled study was to evaluate the effects of a modified formulation of AquADEKs® (AquADEKs-2) on markers of inflammation, antioxidant levels, and oxidative stress. Plasma, serum and sputum will be banked.

Visit #	Time From Baseline	Specimens Collected
2	+0 Days	EDTA plasma, Serum
4	+16 Weeks	EDTA plasma, Serum

### Study Design

<b>Study Type?</b>	Interventional
<b>Randomized Study?</b>	Yes
<b>Placebo Controlled?</b>	No
<b>Length of Participation</b>	20 Weeks
<b>Number of Study Visits?</b>	4

### Additional Information

<b>Phase?</b>	Phase Two
<b>Study Sponsor?</b>	Sagel, Scott
<b>Study Drugs?</b>	AquADEKs-2

## Eligibility

<b>Age</b>	10 Years and Older
<b>Mutation(s)</b>	No Mutation Requirement
<b>FEV1% Predicated</b>	40 to 100%
<b>PA Status</b>	Not Applicable
<b>Other</b>	

## Study Results

### WHAT WE LEARNED:

This study found that participants being treated with AquADEKs-2 did not have significant reduction in respiratory inflammation when compared with the control multivitamin group. AquADEKs-2 was well-tolerated.

### PRIMARY FINDINGS:

#### EFFECTIVENESS:

This study was conducted between September 2013 and June 2015. Of the 73 participants enrolled in the study, 36 were randomized to the AquADEKS-2 group (antioxidant-enriched multivitamin) and 37 to the control multivitamin group. A total of 69 participants completed the study (AquADEKs-2= 34 and control multivitamin= 35).

The primary efficacy endpoint of this study was to measure the change in sputum myeloperoxidase levels between the two groups. Sputum myeloperoxidase is a measure of respiratory inflammation. This study did not meet its primary endpoint as there was no difference in sputum myeloperoxidase levels between the AquADEKs-2 group and the control group at week 16.

#### SAFETY:

The adverse event profile was similar for both the AquADEKs-2 group and control multivitamin group.

### CITATION:

Am J Respir Crit Care Med, DOI 10.1164/rccm.201801-0105OCE-publish ahead of print

For more information about the results of this study and where it was conducted, visit [ClinicalTrials.gov](https://clinicaltrials.gov).