



Canadian  
Malnutrition  
Task Force™

le Groupe de  
travail canadien  
sur la malnutrition<sup>MC</sup>

A Précis of the publication: *Decline in nutritional status is associated with prolonged length of stay in hospitalized patients admitted for 7 days or more: A prospective cohort study.*

Allard JP, Keller H, Jeejeebhoy KN, Laporte M, Duerksen DR, Gramlich L, Payette H, Bernier P, Davidson B, Teterina A, Lou W. Decline in nutritional status is associated with prolonged length of stay in hospitalized patients admitted for 7 days or more: a prospective cohort study. *Clinical Nutrition*. Epub Jan 21 2015  
doi:10.106/j.clnu.2015.01.009

The objectives of this study were to assess the change in nutritional status during hospitalization and determine if its decline is associated with prolonged length of stay (LOS).

Patients enrolled in the Nutrition Care in Canadian Hospitals (NCCH) study that had a LOS of at least 7 days, discharged alive and with subjective global assessment performed at admission and discharge were included in the analysis (n=409). Of the 409 patients, 373 patients had weights measured at admission and discharge. Association between LOS and changes in SGA or weight loss  $\geq 5\%$  during admission was tested using multivariate analysis (Cox Proportional Hazards).

### **Key Findings:**

Of the 409 patients, the median LOS was 11 days. At admission, 49% of patients were well nourished (SGA A), 37% of patients were mildly or moderately malnourished (SGA B) and 14% were severely malnourished (SGA C). From admission to discharge, 34% remained well-nourished, 29% remained malnourished (SGA B or C), 20% deteriorated and 17% improved. Of those patients that had weight measurements at admission and discharge: 92 (25%) had  $\geq 5\%$  weight loss during their admission. After adjusting for covariates, decline in nutritional status from SGA A to B/C or SGA B to C and weight loss  $\geq 5\%$  were significantly associated with a longer LOS.

### **Clinical relevance:**

In-hospital decline in nutritional status as assessed by SGA or weight loss  $\geq 5\%$  is associated with prolonged LOS. This association is independent of factors typically believed to drive the length of admission including demographics, living accommodations and disease severity. **This analysis suggests an important role**

**for nutrition care to maintain and improve nutritional status during admission irrespective of other treatments**

Please visit the CMTF web site <http://nutritioncareincanada.ca/resources/> for an update on the resources available to you to help prevent, detect and treat malnutrition

**This resource is made possible by unrestricted educational grants received in 2015 from our Visionary partner - Abbott Nutrition and Nourisher partner- Nestlé Health Science.**