



Corrigendum: *Fusobacterium nucleatum* Activates Endoplasmic Reticulum Stress to Promote Crohn's Disease Development via the Upregulation of CARD3 Expression

Pan Cao^{1,2}, Yongyu Chen^{1,2}, Xufeng Guo^{1,2}, Yan Chen^{1,2,3}, Wenhao Su^{1,2,3}, Na Zhan^{1,2,3} and Weiguo Dong^{1,2*}

¹Department of Gastroenterology, Renmin Hospital of Wuhan University, Wuhan, China, ²Key Laboratory of Hubei Province for Digestive System Disease, Wuhan, China, ³Central Laboratory, Renmin Hospital of Wuhan University, Wuhan, China

Keywords: *F nucleatum*, intestinal mucosal barrier, endoplasmic reticulum stress, Crohn's disease, gene regulation

OPEN ACCESS

Edited and reviewed by:

Julian Aurelio Marschner,
Hospital of the University of Munich,
Germany

*Correspondence:

Weiguo Dong
dongweiguo@whu.edu.cn

Specialty section:

This article was submitted to
Inflammation Pharmacology,
a section of the journal
Frontiers in Pharmacology

Received: 25 February 2021

Accepted: 07 May 2021

Published: 19 May 2021

Citation:

Cao P, Chen Y, Guo X, Chen Y, Su W,
Zhan N and Dong W (2021)
Corrigendum: *Fusobacterium*
nucleatum Activates Endoplasmic
Reticulum Stress to Promote Crohn's
Disease Development via the
Upregulation of CARD3 Expression.
Front. Pharmacol. 12:672387.
doi: 10.3389/fphar.2021.672387

A Corrigendum on

Fusobacterium nucleatum Activates Endoplasmic Reticulum Stress to Promote Crohn's Disease Development via the Upregulation of CARD3 Expression

by Cao, P., Chen, Y., Chen, Y., Su, W., Zhan, N., and Dong, W. (2020). *Front. Pharmacol.* 11:106. doi: 10.3389/fphar.2020.00106

Xufeng Guo was not included as an author in the published article. The corrected Author Contributions Statement appears below.

In the original article, there was a mistake in **Figure 2F** as published. The carelessness in combining the images caused the repetition of the images. The corrected **Figure 2** appears below.

Furthermore, a brief description was added to the annotations in **Figure 2**, indicating that these are serial sections from the same animal. The corrected Figure legend appears below.

AUTHOR CONTRIBUTIONS

Study conception and design: WD, PC, YC; Specimen provision: NZ, XG; Acquisition of clinical data: PC, YC, YC, XG; Data analysis and interpretation and statistical analysis: PC, YC, YC, XG; Animal experiments: PC, YC, YC, WS, XG; Manuscript drafting: PC, YC, WD.

The authors apologize for this error and state that this does not change the scientific conclusions of the article in any way. The original article has been updated.

Copyright © 2021 Cao, Chen, Guo, Chen, Su, Zhan and Dong. This is an open-access article distributed under the terms of the Creative Commons Attribution License (CC BY). The use, distribution or reproduction in other forums is permitted, provided the original author(s) and the copyright owner(s) are credited and that the original publication in this journal is cited, in accordance with accepted academic practice. No use, distribution or reproduction is permitted which does not comply with these terms.

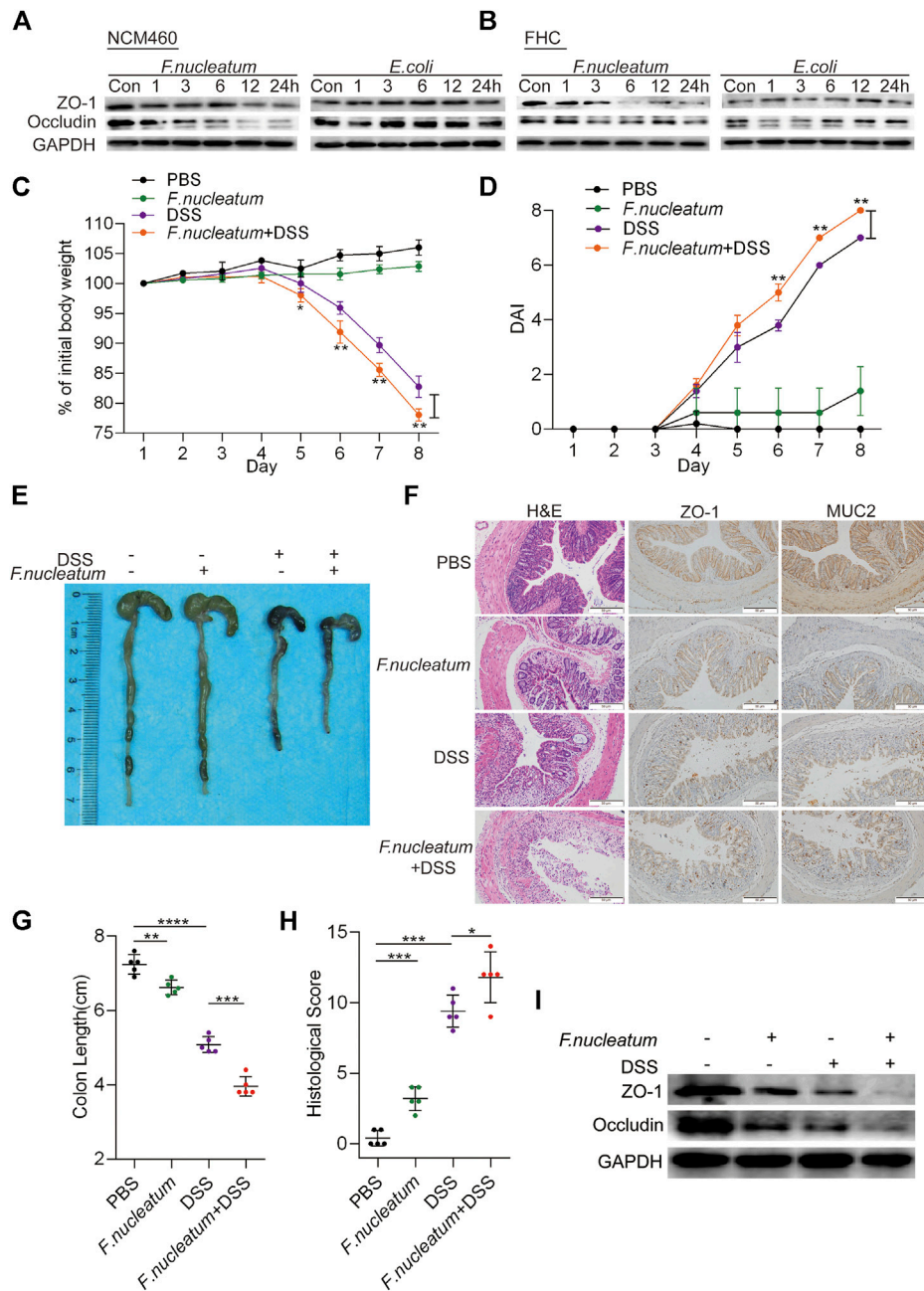


FIGURE 2 | *Fusobacterium nucleatum* destroys epithelial barrier function *in vitro* and *in vivo*. **(A,B)** Western blotting was performed to measure the expression of ZO-1 and occludin in NCM460 cells **(A)** and FHC cells **(B)** cocultured with *F. nucleatum*, *Escherichia coli*, or phosphate-buffered solution (PBS) (Control, Con). **(C,D)** Mice ($n = 5$ per group) were administered *F. nucleatum* or PBS for 2 weeks and treated with 3% dextran sulfate sodium (DSS) for 7 days. Colitis induction was evaluated by body weight loss **(C)** and the disease activity index (DAI) **(D)**. ($*p < 0.05$, $**p < 0.01$, and $***p < 0.001$; one-way ANOVA combined with Bonferroni's *post hoc* test; the error bars indicate the SDs). **(E–G)** Representative colon morphology and length in the mice are shown in panel **(E)** and quantified in panel **(G)**. The sections used for HE, MUC2, and ZO1 staining were from the same mouse in the same group and three sections of the same tissue were stained separately. Representative images of histological analyses are shown in panel **(F)** and quantified in panel **(H)**. Representative images of MUC2 and ZO-1 expression are shown in panel **(F)** ($*p < 0.05$, $**p < 0.01$, and $***p < 0.001$; unpaired Student's *t* test; the error bars indicate the SDs; 200 \times magnification). **(I)** Western blotting was performed to measure ZO-1 and occludin expression in mouse tissues.