生物策略表

類別	生物策略 (Strategy)
生物策略	生物聚合物停止殼的生長
STRATEGY	(Biopolymer stops shell growth)
生物系統	牡蠣 Ostreidae
LIVING SYSTEM	(True oysters)
功能類別	#改變大小/形狀/質量/體積 #化學性組成有機化合物
FUNCTIONS	#調節生殖或生長
	#Modify size/shape/mass/volume
	#Chemically assemble organic compounds
	#Regulate reproduction or growth
作用機制標題	聚天門冬胺酸鹽是牡蠣中的生物聚合物,可通過抑制過量碳酸鈣的
	生成來停止貝殼的生長
	(Polyaspartate is a biopolymer in oysters that stops growth of shells by
	inhibiting growth of excess calcium carbonate.)
生物系統/作用機 制示意圖	

作用機制摘要說明 (SUMMARY OF FUNCTIONING MECHANISMS)

聚天門冬氨酸鹽 (polyaspartate) 是牡蠣中的一種生物聚合物,它可通過抑制過量碳酸鈣的生成來停止貝殼的生長。

Polyaspartate is a biopolymer in oysters that stops growth of shells by inhibiting growth of excess calcium carbonate.

文獻引用 (REFERENCES)

聚天門冬氨酸是由牡蠣產生的生物聚合物,它可幫助其殼塑形成特定的形狀。聚天門冬氨酸阻止了牡蠣殼的主要成分碳酸鈣的過度生成。(Ashley 2002: 32-33)

Polyaspartate is a biopolymer produced by oysters to help mold their shells into their characteristic shape. Polyaspartate stops excess growth of calcium carbonate, the principal constituent of oyster shells. (Ashley 2002: 32-33)

參考文獻清單與連結 (REFERENCE LIST)

Wheeler, A. P., J. W. George, and C. A. Evans. (1981). Control of calcium carbonate nucleation and crystal growth by soluble matrix of oyster shell. *Science* 212: 1397-1398.

(https://science.sciencemag.org/content/212/4501/1397)

延伸閱讀: Harvard 或 APA 格式

AskNature Team. (October 1, 2016). NanoChem BioPolymers. *AskNature*. Retrieved from: https://asknature.org/idea/nanochem-biopolymers/

生物系統延伸資訊連結 (LEARN MORE ABOUT THE LIVING SYSTEM/S)

https://en.wikipedia.org/wiki/Ostreidae

撰寫/翻譯/編修者與日期

詹凱涵翻譯 (2020/04/24); 許秋容編修 (2020/05/22); 譚國鋈編修 (2020/06/09)

AskNature 原文連結

https://asknature.org/strategy/biopolymer-stops-shell-growth/