

7HP SHUDWXUH DQG ~~Craspedovirus~~ ~~Fixa~~ V H RI  
DQG LWVV (brid) ~~DFVR~~ QULD  
/DZUHQFH /DP  
&ROORJ ~~SHUWV~~ DQG 6FLHQFHV %LRORJ\  
'RQQD / 5KRDGV

Abstract

Vibrio LQIHFWRQV DUH RQH RI WKH OHDGLQJ FDXVHV RI VHDIRRG

Table 1: & RORRQVPLQJ XQLW FRXQWV VDPQCRDKRPLRCHWR]SMURKRXDUG WLVQRWHG WKDW DOWKRX  
DEXQGDQW H[SHULPHQWDOO\ FRXQWDPZRUHKBPRJHQE]HG FRQDWRDQ WLVVXH 8SRQ VWDQGDQ  
WLVVXH DOO H[SHULPHQWDO YDOXH V ZHUH DPSOLILHG

ZHUH WKHQ VWRUHG WRJHWKHU XQGHU WKH GHVLUHG H[SHULPHQWDO  
FRQGLWLRQV ~~FR]HL]WKHU RU 7KH~~  
R\VVWHUV ZHUH SDUWLDOO\ ZUDSSHG LQ D PRLVW SDSHU WRZHO WR  
PDLQWDLQ KXPLGLW\ 7KH GXUDWLRQV DW ZKLFK WKH VDPSONV ZHUH  
VWRUHG XQGHU WKH GHVLUHG H[SHULPHQWDO FRQGLWLRQV ZHUH RQH  
WZR IRXU DQG VHYHQ GD\ \$W HDFK RI WKHVH GHVLUHG  
LQFXEDWLRQ SHUVRGV ZHUH ZRPR\WHG IURP WKH  
VDPSON SRRO 7KHVH RHWLHQV ZKXFNWCHQ ZDVK  
)ROORZLQJ WKH VKXFNLQJ RI WKH R\VVWHUV WKH R\VVWHU WLVVXH ZDV  
SODFHG LQWR D VWHULOH EOHQGHU DQG WKH DPRXQW RI R\VVWHU WLVVX  
XVHG ZDV QRWHG P/ RI ~~DKHQ~~LILFLDO VHDZDWHU ZDV W  
DGGHG WR WKH EOHQGHU DQG WKH FRQWHQWV ZHUH EOHQGHG IRU D  
PLQXWH IRU KRPRJHQL]DWLRQ 7KH KRPRJHQL]HG R\VVWHU WLVVXH  
ZDV WKHQ WUDQVIHUUHG ~~BRICSDWWR & Q520~~DJDU  
WZR DOLT ~~RWQR/ )RU~~ WKH ~~W~~WULDOV DW  
RQO\ ~~+~~ DOLT ~~ZRUWH~~ XVHG DV WKHVH WULDOV ZHUH  
SHUIRUPHG GXULQJ WKH SURFHVV RI GHWHUPLQLQJ WKH EHVW  
SURFHGXUH WR IROORZ



H[SHULPHQWDO SHULRG RI KRXUV XQGHU WKHVH FRQGLWLRQV  
ZDV QRWHG WR EH QRQYLDEOH EDV RZHYHU LQWHUHVWLQJO\  
VWLOO DEOH WR JURZ XQGHU WKHVH FRQGLWLRQV DOWKRXJK SURYLGLO  
GUDVWLFDOO\ ORZHU FRXQWV 2Q WKH RWKHU KDQG DW WKH KLJKHVW  
H[SHULPHQWDO WHPSHUDWXUHV RI f& LW ZDV REVHUYHG WKDW  
ZDV QRW SUHVHQW DIWHU H[WHQG HG SHULRGV RI LQFXEDWLRQ ,Q  
FRPSDU\ WHPSHUDWHG DW DQ H[SRQHQLDO UDW 1RWLQJ  
WKDW WKH LQFXEDWLRQ WHPSHUDWXUH RI f& ZDV LQWHQG HG WR  
VLPXODWH WKH FRQGLWLRQV LQVLGH WKH KXPDO ERG\ WKLV UHVXOW  
ZDV XQH[SHFWHG EXW QRW LQFRQVLVWHQW DV WKH VDPH  
REVHUYDWLRQ ZDV QRWHG IRU ERWK WULDOV DW f& DQG  
UHDVRLQJ EHKLQG WKLV LV XQNQRZQ +RZHYHU RQH SRVVLELOLW\  
FRXOG EHLW KLQW DSDEOH RIVFRPSHWLQJ ZLWK  
UHVXODVH DW KLJKHU H[SHULPHQWDO WHPSHUDWXUHV WKH  
&+520DJDU SODWHV ZHUH KLJKO\ FRQIOXHQW UHVXOWLQJ LQ  
LQFUHFRPSHWLWLRQ IRU VSDGHG DW GROXW BLHQWV  
WKLV WKH UHVXOWV RI 3&5 DQG HOHFWURSKRUHVLV GLG FRQILUP WKDW  
WKH FRXQWV UHFRUGHG ZHUH DQGLQRMDFW IRU

V. cholerae.

5HIOHFWLQJ RQ WKH GDWD SURGXFHG PDQ\ PLQRU  
LQFRQVLVWHQW RWHG PDREHYHU WKH VFRSH LQ ZKLFK  
WKLV SURMHFW ZDV SHUIRUPHG PXVW EH WDNHQ LQWR DFFRXQW 'XH  
WR FRQVWUDLQWV LQ WLPH DQGUHVVRXUFHV PXOWLSOH WULDOV XQ  
HDFK H[SHULPHQWDO GROGSMUHQPHG UHVXOWLQJ  
LQ OHVV WKDQ GHVLUDEOH VWDWLVWLFDO YDULDWLRQ

References

%LYDOYH 'HSXUDWLRQ )XQGDPHQWDO DQG 3UDFWLFDO  
\$VSHFWV Depuration: Fundamental and Practical  
Aspects 1 S Q G :HE 0DU  
KWWS ZZZ IDR RUJ GRFUHS L H L H KWP!  
&KURPRJHQLF Chromogenic Agar  
Technology 1 S p0 1 SU 1 1