

&XUULFXOXP 9LWDH

' \$0,(1 &217(66\$

>Bc™y\$80 OLHG 6RFLRORJ\

1RUWKHUQ \$ULJRQD 8QLYHUVLW\
*UDGXDWHG ZLWK +RQRUDEOH 'LVWLQFWLRQ
7KHV\$V:ROI LQ WKH 6KDGRZ RI WKH 0RXQWDLQ 5H
0HWD\$K(RU LURQPHQWDO &RQVFLRXVQHVV

% \$ 6RFLRORJ\
6WDWH 8QLYHUVLW\ RI 1HZ <RUN DW 1HZ 3DOW]

* 5\$176 \$1\$: \$5'6

&HQWHU)RU 7HDFKLQJ DQG /HDUQLQJ
/HDUQLQJ (QULFKPHQW *UDQW
8QLYHUVLW\ RI 7DPSD

- 5LFKDUG 3LSHU 2XWVWDQGLQJ \$GYLVRU RI WKH <HDU
6SDUWDQV \$JDLQVW +RPHOHVVQHVV
/HDGHUVKLS \$ZDUGV 1LJKW
8QLYHUVLW\ RI 7DPSD

\$\$&6 6WXGHQ\$WR&EOLHFQWRPISQHWLWLRQ
)LUVW 3ODFH LQ &RQIHUHQFH DV \$GYLVRU
\$VVRFLDWLRQ RI \$SSOLHG DQG &OLQLFDO 6RFLRORJ\

3URYRVW↑V \$ZDUG IRU 2XWVWDQGLQJ 7HDFKLQJ
E\ D *UDGXDWH 7HDFKLQJ \$VVLVWDQW
&HUWLILFDWH RI 5HFRJQLWLRQ
\$FDGHP\ IRU 7HDFKLQJ DQG /HDUQLQJ ([FHOHQFH
8QLYHUVLW\ RI 6RXWK)ORULGD

'LVWLQJXLVKHG 7HDFKLQJ \$ZDUG
'HSDUWPHQW RI 6RFLRORJ\
8QLYHUVLW\ RI 6RXWK)ORULGD

326,7,216(/'

)DOO 3UHVHQW
\$VVLVWDQW 7HDFK6RQJL3ORUHVVURU RI
'HSDUWPHLQW6RFLRORJ\ DQG /HJDO 6WXGLHV
8QLYHUVLW\ RI 7DPSD

9LVLWLQJ ,QIV6RFLRORJ\
'HSDUWPHLQW6RFLRORJ\
8QLYHUVLW\ RI 7DPSD

\$5(\$6 2)5(6(\$5&+ 7(\$&+,1*,17(5(67

(QYLURQPHQWDO 6RFLRORJ\3V\FKRORJ\
,QWURGXFWRQ WR 6RFLRORJ\0HWKRGRORJ\
6RFLRORJ\ RI &KLOGKRRG (WKQLF 5HODWLRQV

7(\$&+,1*(;3(5,(1&(

\$V ,QVWUXFWRU

5DFLDO DQG (WKQLF 5HODWLRQV

)DOO
0D\ 7HUP
)DOO
6SULQJ
0D\ 7HUP

4XDOLWDWLYH 5HVHDUFK 0HWKRGV

6SULQJ
6SULQJ
6SULQJ

6RFLRORJ\ RI &KLOGKRRG

6XPPHU RQOLQH
6SULQJ
6SULQJ
6SULQJ

5HVHDUFK 0HWKRGRORJ\
)DOO

6RFLDO 3V\FKRORJ\
)DOO
)DOO
)DOO
)DOO
6SULQJ

1HZ &ROOHJH RI)ORULGD)DOO

(QYLURQPHQW 6RFLHW\
'HSDUWPHQW RI 6RFLRORJ\
8QLYHUVLW\ RI 6RXWK)ORULGD)DOO
6SULQJ
6XPPHU

&ODVVLFD 6RFLDO 7KHRU\
'HSDUWPHQW RI 6RFLRORJ\
8QLYHUVLW\ RI 6RXWK)ORULGD 6SULQJ
6XPPHU

(QYLURQPHQW 6RFLHW\
Online &RXUVH
'HSDUWPHQW RI 6RFLRORJ\
1RUWKHURU &QLYHUVLW\
)DOO
6SULQJ

6HOI 6RFLHW\
'HSDUWPHQW RI 6RFLRORJ\
8QLYHUVRI 6RXWK)ORULGD

)URP 3HVWLOHQFH WR)RON +HUR 1DUUDWLYHV RI 7UDQVIRUP
0RQNH\ RI 7DPSD %D\
3DQHO 0HGLD 3RS &XOWXUH DQG *DPLQJ
\$VVRFLDWLRQ IRU +XPDQLVW 6RFLRORJ\ \$QQXDO &RQIHUHQFH
&OHYHODQG 2KLR

2Q WKH /DP 7KH 6KLIWLQJ ,GHQWLWLHV RI WKH 0\VWHU\ 0RQN
3DQHO 5DQV 5DFH 7HHQ 3UHJQDQF\ D 0RQNH\ \$QDO\]LQJ 0HGL
6RFLRORJLFDQ ,QVLJKWV
3DFLILF 6RFLRORJLFDQ \$VVRFLDWLRQ \$QQXDO &RQIHUHQFH
3RUWODQG 2UHJRQ

8QUDYHOLQJ 0RQVWURXV 6WRULHV 7KH &XOWXUDO /RJLF RI 1
3DQHO (QYLURQPHQWDO &RPPXQLFDWLRQ
1DWLRQDO &RPPXQLFDWLRQ \$VVRFLDWLRQ &RQIHUHQFH
2UODQGR)ORULGD

7KH\ &DPH IURP 2KLR \$QLPDOV 0RQVWHUV DQG 1DUUDWLYHV
3DQHO ,PSRUWDQFH RI /RRNLQJ DW \$QLPDOV LQ 6RFLRORJ\
\$PHULFDQ 6RFLRORJLFDQ \$VVRFLDWLRQ &RQIHUHQFH
'HQYHU &RORUDGR

7KH (QYLURQPHQW)URP %HORZ 6RFLRORJ\ 6RFLRORJLFDQ
3DQHO (QYLURQPHQWDO 6RFLRORJLFDQ 6RFLRORJLFDQ
3DFLILF 6RFLRORJLFDQ \$VVRFLDWLRQ &RQIHUHQFH
6DQ 'LHJR &DOLIRUQLD

:ULWLQJ /LYHV 0LQGIXO ,QTXLU\ LQ (YHU\GD\ /LIH
3DQHO &RQVFLRXVQHVV DQG 6RFLDO &KDQJH
3DFLILF 6RFLRORJLFDQ \$VVRFLDWLRQ &RQIHUHQFH

F'àS@À5PD@J (Q 0À@ À0

WR WKH 8QLYHUVLW\ RI 7DPSD

'HYHORSPHQWWRPSFH2019LQ 6RFLRORJ\ RI &KLOGKRRG &RXUVH

/HDGHUVKLSLSZDUGMOHFWLRQ &RPPLWWHH

\$FWLYH /HDUQLQHVLQRFUWPHH

6WXGHQW \$FDLXDWLRQ &RPPLWWHH
*URXS ,QWHUYLHZ ZLWK ([WHUQDO 5HYLHZHU

\$G +RF &RPPLWWHGXUQ 7RDFN)DFXOW\

±3UHVHQW
\$GYLVLQJ &RPPLWWHH

6XVWDLQDELOLW\ &RPPLWWHH

&RFKDLU RI 6HDUFK &RPPLWWHH
'HSDUWPHQW RI 6RFLRORJ\

±SUHVHQW
6SDUWDQV \$JDLQVW +RPHOHVVQHVV)DFXOW\ \$GYLVRU

WR WKH 6RFLRORJ\ 'HSDUWPHQW RI WKH 8QLYHUVLW\ RI

3UHVHQW
6RFLRORJ\ &OXE)DFXOW\ \$GYLVRU
)DFXOW\ \$GYLVRU WRXU8013\$QV EOHV &RPSHWLWLRQ
6RFLRORJ\ 'HSDUWPHQW (YDOLXDWLRQ 6XUYH\ &R
)DOO &RQYRFDWLRQSRFHVWQDWRUHW

WR WKH 6RFLRORJ\ 'HSDUWPHQW RI WKH 8QLYHUVLW\ RI

,QWHUGLVFLSOLQDQWGRUHQVLFUHQFH

*UDGXDW 7HDFKLQJ \$VVLVWDQW 0HQWRU

)DFXOW\ 0HPEWHUHQVFLSOLQDQWGRUHQVLFUHQFH &RPPLWWHH

)DFXOW\ 0HPEHU RQ (YHQWV DQG &ROORTXLXP &RPPLWWHH

*UDGXDWH 7HDFKLQJ \$VVLVWDQW 0HQWRU

&R)RXQGHU DQGR7IUGRDFLXURU\ *UDGXDWH 6WXGHQW 0QCE ñ c9W