

## B : Hg`g]bX`Ui h'6U: ]b`bcWÅ`\_Y]bY K YfhdUd]YfY

A Y\fyfY ; Yf]WÅhgVUf\_Y]hYb`Ui ZXYf`[ Ubnyb`K Y`h\UVYb`]\fy  
6Ya Ø\i b[ Yb`ni f`FY[ i`]Yfi b[ `XYf`6fUbWÅY`ZØf`X][ ]hU`Y  
JYfa Ò[ Ybgk YfhY`j YfghÅf`h"5i WÅ`]b`8Yi hgWÅ`UbX`Uh`X]Y  
: ]bUbnUi Zg]WÅh`@Y]h`b]Yb`ni f`Ui Zg]WÅhgfyWÅh`]WÅYb  
6Y\UbX`i b[ `j cb`?fmdhck Å\fi b[ Yb`\YfUi g[ Y[ YVYbži bhYf  
UbXYfYa`ni a`Nk YW\_Y`XYf`6Y\_Åa dZi b[ `j cb` ; Y`Xk ÅgWÅY  
i bX`HYffcf]ga i gZ]bUbn]Yfi b[ "9g`k Uf`dfcU\_hj`VY]a`9f`Ugg  
j cb`FYWÅhgj cfgWÅf]ZhYb`ni`5gdY\_hYb`k ]Y`XYf`b]h]U`Y`Wc]b  
5b[ YVchYž`GYW`f]hm`Hc\_Yb`CZZf]b[ g`gck ]Y`XYnYbhfU`Y`5ddg  
fX5ddgk`K Å\fybX`X]Y`fyWÅh`]WÅYb` ; fUi ncbYb`j cb`B: Hg  
bcWÅ`fy[ `Ya Ybh]Yfh`k YfXYb`a ØggYbž`\Uh`8Yi hgWÅ`UbX`YfghY  
GWÅf]hhY`i bhYfbca`a Ybži`a`Ui WÅ`\]Yf`?`Uf\Y]h`ni`gWÅUZZYb`  
6U: ]b`ni`B: Hg`8]Y`6i bXYgUbghU`h`ZØf  
: ]bUbnX]YbghY]ghi b[ gUi Zg]WÅh`f`B: ]b`l`\Uh`VYghÅh][ hž`XUgg  
b]WÅh`Zi b[ ]V`Y`Hc\_Yb`f`B: Hg`l`\_Y]bY`K YfhdUd]YfY`gY]b  
/ Ua d^Y`d/



A Y\fyfY ; Yf]WÅhgVUf\_Y]hYb`Ui ZXYf`[ Ubnyb`K Y`h\UVYb`]\fy

6Ya Ø\i b[ Yb'ni f'FY[ i `]Yfi b[ 'XYf'6fUbWxY'ZØf'X][ ]hU`Y  
J Yfa Ø[ Ybgk YfhY'j YfghÅf\_h"5i Wx`]b'8Yi hgWx`UbX`\Uh'X]Y  
: ]bUbnUi Zg]Wxh'@Y]h]b]Yb'ni f'Ui Zg]WxhgfYWxh]WxYb'6Y\UbX'i b[  
j cb'?fmdhck Å\fi b[ Yb`\YfUi g[ Y[ YVYbž'i bhYf'UbXYfYa`ni a  
Nk YW\_Y'XYf'6Y\_Åa dZi b[ 'j cb'; Y`Xk ÅgWxY'i bX  
HYffcf]ga i gZ]bUbn]Yfi b[ "

9g'k Uf'dfcU\_h]j `VY]a `9f`Ugg'j cb`FYWxhgj cfgWx f]ZhYb'ni `5gdY\_hYb  
k ]Y'XYf'Æ]h]U`Y`Wc]b'5b[ YVchYž'GYW`f]hmHc\_Yb`C ZZYf]b[ g'gck ]Y  
XYnYbhfU`Y`5ddg'fX5ddgŁ"K Å\fybX`X]Y`fYWxh]WxYb'; fUi ncbYb  
j cb`B: Hg`bcWx`fY[ `Ya Ybh]Yfhk YfXYb`a ØggYbž`\Uh'8Yi hgWx`UbX  
YfghY`GWx f]hhY`i bhYfbca a Ybž'i a `Ui Wx`\]Yf'?`Uf\Y]h'ni `gWx UZZYb"

## 6U: ]b`ni `B: Hg

8]Y`6i bXYgUbghU`h`ZØf': ]bUbnX]YbghY]ghi b[ gUi Zg]Wxh'f6U: ]bŁ`\Uh  
VYghÅh][ hž'XUgg`b]Wxh'Zi b[ ]V`Y`Hc\_Yb`fB: HgŁ`\_Y]bY`K YfhdUd]YfY  
gY]b`\_ØbbYb" `Æ`Y]bYf`\_Øfn`]Wx`j YfØZZYbh]WxhYb`9f`\_Åfi b[  
Uf[ i a Ybh]YfhYb`X]Y`6YUa hYbž'XUgg`Hc\_Ybž'X]Y`XUg`9][ Ybhi a `Ub  
Y]bYa`X][ ]hU`Yb`J Yfa Ø[ Ybgk Yfh`bi f'ni `GdY`i `Uh]cbgk YW\_Yb  
VYnY]WxYbž'b]Wxh'U`g`5b`U[ Y]bghfi a Ybh'[ Y`hYb"

G]Y`VY\Ui dhYhYž'XUgg`B: Hg`V]g\Yf`\_Y]bY`Å`b`]WxYb`A Yf\_a U`Y`k ]Y  
: ]bUbnk YfhY`k ]Y`5\_h]Yb`i bX`GWx`i`Xh]hY``Ui Zk Y]gYbž'k Ug`Yg  
i ba Ø[ `]Wx`a UWxhž]a`fY[ i `Uhcf]gWxYb`G]bbY`U`g`K YfhdUd]YfY`ni  
[ Y`hYb"

8Yf'6U: ]b`g]bX`V]g\Yf`\_Y]bY`B: Hg`VY`Ubbhž'X]Y`U`g`K YfhdUd]YfY  
]a`Ui Zg]WxhgfYWxh]WxYb`G]bbY`Y]bni ghi ZYb`g]bX"

8]Y`FY[ i `]Yfi b[ gVY\ØfXY`ZØ[ hY`YXcWx`Ui Wx`\]bni ž'XUgg`B: H  
\_ØbZh][ `U`g`K YfhdUd]Yf`Y]b[ Yghi Zh'k YfXYb`\_ØbbhY" `9g`gWx f]YV  
Ui Wxž

K Ybb`B: Hg`U`g`K YfhdUd]YfY`bUWx`XYf`9I !DfcgdY\_hj YfcfXbi b[  
cXYf`U`g`J Yfa Ø[ YbgUb`U[ Yb`bUWx`XYa`J Yfa Ø[ YbgUb`U[ Y[ YgYhn  
fU Yfa 5b`; Ł`Y]bni ghi ZYb`g]bXž'a i gg]a a Yf`Y]b`DfcgdY`h`YfghY``h  
k YfXYb"

≠`9i fcdU'g]bX`U`Y`5i [ Yb`Ui ZX]Y`A ]75`[ Yf]W`hYh"8]Y`YbX[ Ø`h][ Y  
5Vgh]a a i b[ `ØVYf`XUg`a ]h`GdUbbi b[ `Yfk UfhYhY`? fmdhc!  
FY [ Y`k Yf`\_XYf`9i ` `X]Y`A Uf`\_Yhg`]b`7 fmdhc`5ggYhg  
fA ]75!J YfcfXbi b[ ž`X]Y`Ui Z`5df]`&\$&' `j YfgW`cVYb`k i fXYž`k ]fX  
U`g`YfghYg`i a ZUggYbXYg`Yi fcdUk Y]hYg`? fmdhc!FU`a Ybk Yf`\_  
Ub[ Ydf]YgYb"6Ygh]a a i b[ Yb`ZØf`B: Hg`k i fXYb`XUj cb  
Ui g[ Ybca a Yb"

⇒ `j Yf[ Ub[ YbYb`Gca a Yf`XYi hYhY`XYf`6YfUhYf`XYf`9i fcdÅ]gW`Yb  
?ca a ]gg]cbž`DYhYf`?YfghYbgž`YXcW`Ubž`XUgg`B: H!9a ]hYb`hYb  
a Ò[ `]W`Yfk Y]gY`a ]h`5bV]YhYfb`j cb`? fmdhc!5ggYh!8]YbghYb  
[ `Y]W` [ YgYmh`k YfXYb`\_ØbbhYbž`k Ug`g]Y`XUni `j YfdZ]W`hYhž  
fY [ Y`a Å» ] [ Y`6Yf]W`hY`ØVYf`]\fY`5\_hj] ]hÅhYb`VY]`XYf`9i fcdÅ]gW`Yb  
K YfhUd]Yf!`i bX`A Uf`\_hUi Zg]W`hgVY`ÖfXY`VY]`]\fYb`c`\_U`Yb  
FY [ ]Yfi b[ Yb`Y]bni fY]W`Yb"

## 7\]bUg`F Y [ i `]Yfi b [ gfU`a Yb`ZØf`B: Hg

K Å`fYbX`7\]bU`XYb`? fmdhc!<UbXY`j YfVchYb`i bX`XYb`A ]b]b[  
i bhYfVi bXYb`U`hž`k i fXYb`B: Hg`b]W`h`U`g`dchYbn]Y`f]g`\_UbhY  
:]bUbn]bghfi a YbhY`Y]b[ Yghi Zh"HUhgÅW`]W`U`h`Yg`XUg`<sup>2</sup>\_cgmghYa  
[ YgW`UZZž`]b`Y]bYf`fY [ i `Uhc]gW`Yb`; fUi ncbY`b]W`h`bi f`ni  
ØVYf`VYbž`gcbXYfb`Ui W`ni ` [ YXY]\Yb"

8]Y`Ui ZYbXYb` Hk c`GYgg]cbg `XYg`@UbXYg`X]Y`ni ZÅ`][ `XUg  
k ]W`h][ ghY`Å`f`]W`Y`dc`]h]gW`Y`HfYZZYb`g]bX`a ]h`XYa  
DUf`Ua YbhgUV [ YcfXbYhYb`: Yb[ `E ]mU`n]Y`Yb`XUfUi ZUVž`Y]bYb  
FY [ i `]Yfi b [ gfU`a Yb`ZØf`B: Hg`j cfni gW`U [ Yb"

9]b`c`\_U`Yg`A YX]i a `VYf]W`hYhYž`XUgg`XYf`GW`k Yfdi b`\_h`Ui Z`XYf  
9]bZØ`fi b [ `Y]bYf`\_`UfYb`fYW`h]W`Yb`8YZ]b]h]cb`X][ ]hU`Yf  
GUa a `YfghØW`Yž`XYf`9]bZØ`fi b [ `j cb`A Uf`\_hni [ Ub[ gfY [ Y`b`ZØf  
<UbXY`gd`Uhhž`cfa Yb`i bX`XYf`J YfVYggYfi b [ `XYg  
I f`YVYffYW`hgW`i hnYg`ZØf`B: Hg`j]Y [ Yb`k YfXY"

...

6Ygi W\Yb`G]Y`i bg`Ui Z.`\_fmdhc!bYk g"Uh