

Gi bXck bYf`Ua `5`VhfUi Z.`9]b`a U[ ]gWk Yg  
9f`YVb]g`Z0f` ; Yb]Y» YbXY`]b`B Yi ZZYb

9bhXYW\_Yb`G]Y`X]Y`VYghYb`Gi bXck bYf!Gdchg`ja `@UbX\_fY]g  
9gg`b[ Yb.` ; Yb]Y» Yb`G]Y`hfUi a ` \UZhY`GcbbYbi bhYf[ Åb[ Y  
i bX`fY[ ]cbU`Y`? 0gh]Wk\_Y]hYb"

⇒ @UbX\_fY]g`9gg`b[ Yb`[ Y\h`Yg[ YfUXY`\cWk`Yfz`XYbb`X]Y  
@Y]XYbgWk UZh`Z0f`Gi bXck bYf`YfcVYfh`ja a Yf`a Y`f`A YbgWk Yb``8 Ug  
VYgcbXYfY`@VYbg[ YZ0\`ž`XUg`a ]h`XYa ` ; Ybi gg`Y]bYg`8f]b\_g]b  
XYf`a U`Yf]gWk Yb`? i `]ggY`Y]bYg`GcbbYbi bhYf[ Ub[ g`Y]b\Yf[ Y\hž  
gdf]Wk h`Z0f`g]Wk ``K Å`fYbX`X]Y` : UfVYb`XYg`5VYbX\`ja a Y`g`]b`Y]b  
gdY\_hU\_i `ÅfYg`GkUi gd]Y`j Yfk UbXY`h`k YfXYbž`Z]bXYb`ja a Yf  
a Y`f`A YbgWk Yb` : fYi XY`XUfUbž`X]YgYb`A ca Ybh`XYg`b`bY\U`hYbg  
ni `nY`YVf]YfYb"

8]Y` : Y`gYb[ U`Yf]Y`Ui Z`XYa `6fY]hYbghY]b`]gh`a ]hh`Yfk Y]`Y`Y]b  
VY`]YVhYf`Cfhž`i a `X]YgY`a U[ ]gWk Yb`Ghi bXYb`ni `Yf`YVYb``J cb`Xcfh  
Ui g`\Uh`a Ub`Y]bYb`UhYa VYfUi VYbXYb`6`]W`0VYf`X]Y`I a [ YVi b[  
`]XYU`ž`i a `g]Wk `bUWk `Y]bYa ``Ub[ Yb`HU[ `ni `YbhgdUbbYb``8]Y  
GnYbYf]Y`j YfghÅ`f`h`g]Wk `Xi fWk `X]Y`K ]f\_\_fUZh`XYf`B Uhi fi bX`XYg  
5i gV`]W\_gž`k Å`fYbX`X]Y`5VYbXgcb`bY`gUbZh]b`XYf` : YfbY  
j YfgWk ]bXYh"

## 8 Yf`5i Zgh]Y[ `XYg`Gi bXck bYfg

⇒ B Yi ZZYb`g]bX`X]Y`Gi bXck bYf!Gdchg`Z0fa `]Wk `Ui g`XYa `6cXYb  
[ YgWk cggYb``9`\_Y`A i W\_YbZ ` » ž`Y]bY`Yb[ U[ ]YfhY`K ]bnYf]b`Ui g`XYf  
F Y[ ]cbž`]gh`Y]b`6Y]gd]Y`Z0f`X]YgY`9bhk ]W`i b[ ``GY]h`bi ba Y`f`nY\`b  
»\`fYb`V]YhYh`g]Y`a ]h`\`fYa `a cV]`Yb`Gi bXck bYf`ja `K Y]bVYf[ `Y]b  
Y]bn][ Ufh][ Yg`9f`YVb]g`Ub``9]bZUWk Y`6]YfVÅb\_Y`fi bX`i a `]\`f  
K Yb[ YfhYf!<Åi g`Y`UXYb`X]Y` ; Ågh`Y`Y]bž`VY]`Y]bYa ` ; `Ug`K Y]b`Ui g

Y][ YbYf'DfcXi \_h]cb'i bX'ZY]bYa : ]b[ YfZccX'ni 'j Yfk Y]'Yb"" 9]b  
V]ggWXYb'8Y\_c'i bX'@]W\hYf\_YhhYb 'j Yf'Y]\Yb'XYf'J YfUbgHUh'i b[  
Y]bY'VYgcbXYfY'B chYž'X]Y'k Å\YfYbX'XYf'A cbUhY'j cb'A U]'V]g  
5i [ i gh'Y]bYb'ZYghYb'D`Uhn'ja ' ? U`YbXYf'j ]Y`Yf'A YbgWXYb'\Uh"  
8]YgY' ]bZcfa Y`Yb'HfYZZYb'Z]bXYb'ja a Yf'Ua 'Xf]hhYb': fY]hU[ 'ja  
A cbUh'ghUhi bX'YfZfYi Yb'g]W' [ fc» Yf'6Y' ]YVh\Y]h"

8Yf'6Y[ f]ZZ' Gi bXck bYf' cXYf'Ui W' 8Åa a YfgW\cddYb  
VYnY]W\ bYh'cZh'Y]b'U`\_c\c`]gWXYg; YhfÅb\_ž'XUg' ]b'XYf'YbhgdUbbhYb  
5ha cgd\ÅfY'Y]bYg'GcbbYbi bhYf[ Ub[ g[ YbcggYb'k ]fX""9g']gh'XYf  
dYfZY\_hY'A ca Ybhž'i a 'g]W'a ]h': fYi bXYb'cXYf' ]b'Ub[ YbY\ a Yf  
; YgY`gW UZh'ni gUa a Ybni Z]bXYb'i bX'XYb'HU[ 'FYj i Y'dUgg]YfYb  
ni ``UggYb""8 Ug'[ YgY``[ Y'6Y]gUa a YbgY]b'i bX'X]Y; Ya Y]bgW UZhž  
X]Y'Xi fW'gc`WY'J YfUbgHUh'i b[ Yb' [ YZØfXYfhk YfXYbž'g]bX'j cb  
i bgW ÅhnVUfYa 'K Yfh"

8]Y': Ugn]bUh]cb'XYg'Gi bXck bYfg` ]Y[ h'b]W\h'bi f'ja ' [ Ya Øh]WXYb  
5a V]YbhYž'gcbXYfb'Ui W' ]b'XYf'A Ø[ `]W\_Y]hž'X]Y'bUhØf`]WXY  
GW\Øb\Y]h'XYf'I a [ YVi b[ 'k U\fn' bY\ a Yb""CV'VY'Y]bYa : ; `Ug  
Fchk Y]b'cXYf'Y]bYa '\_Ø\`Yb'6]Yf' `XUg'5a V]YbhY'XYg  
: Y]YfUVYbX[ Ybi ggYg'Vf]b[ h'A YbgWXYb'ni gUa a Yb'i bX'gcf[ h'ZØf  
VY[ Y]ghYfhY; YgdfÅWY'ØVYf'XYb'HU[ 'i bX'XUg'@YVYb"

8 Ug'D\Åbca Yb' ]gh'k Y]hfY]WXYbX'i bX'gW\`ØdZh' ]b'X]Y  
i bhYfgW ]YX`]W\ ghYb'J Uf]UbhYb""J cb'XYb'K Y]bVYf[ Yb'ØVYf'X]Y  
FUXk Y[ Y'V]g'\ ]b'ni 'I fVUbYb'< chgdchg. ', VYfU`` ]a ' @UbX\_fY]g  
9gg` ]b[ Yb' ]gh'X]Y' ðXY'XYg'Gi bXck bYfg'ni 'gdØfYb""8 ]YgY  
HfYZZdi b\_hY'g]bX'a Y\ f'U'g'bi f'C fhY'XYf'9bhgdUbbi b[ ' ]g]Y'g]bX  
Y]b'U\_h]j Yf'6YghUbXhY]'XYf'gcn]U`Yb' ðhYfU\_h]cb' ]b'Y]bYf'F Y [ ]cbž  
X]Y'a ]h']\fYf'bUhØf`]WXYb'GW\Øb\Y]h'i bX'; UghZfYi bXgW UZh' [ `Åbnh"

8]Y'Gh]a a i b[ gk YbXYž'X]Y'gc`W\`Y]bZUWXY'I bhYfbY\ a i b[ Yb'a ]h  
g]W\`Vf]b[ Yb'\_ØbbYbž' ]gh'VYa Yf\_Ybgk Yfh""Gi bXck bYf'g]bX'b]W\h  
bi f'Y]bY'A Ø[ `]W\_Y]hž'8 f]b\_g'ni ' [ Yb]Y» Ybž'gcbXYfb'Ui W'Y]bY  
: cfa 'XYf'GY'Vghj Yfk ]f\_`]W\i b[ 'i bX'XYg'Ni gUa a YbgY]bg' ]b'XYf  
BUhi f""8 Ug'ghY][ YbXY' ðhYfYggY'Ub'X]YgYb'J YfUbgHUh'i b[ Yb'nYi [ h  
j cb'Y]bYa 'h]YZYb'6YXØfZb]g'bUW'J YfV]bXi b[ Yb' ]b'Y]bYf'K Y'hž'X]Y  
cZh'\Y\_h]gW' i bX' [ YgW\ÅZh][ ' ]gh' ðXYf'GcbbYbi bhYf[ Ub[ ž'XYb'a Ub

a ]h'Y]bYa ' [ i hYb'; `Ug' ]b'XYf' < UbX' [ Yb]Y» hž'k ]fX'ni 'Y]bYa  
A ca Ybh'XYg'dYfgØb`]WXYb'; `ØW\_g'i bX'XYf': fYi XY"

8]Y'9bhk ]W\_`i b[ `XYg'Gi bXck bYf!HfYbXg'nY][ h'XYi h`]Wž'XUgg  
Y]bZUWXY': fYi XYbž'k ]Y'g]Y'VY]'X]YgYb' [ YgY``][ Yb  
Ni gUa a YbhfYZZYb'ghUhhZ]bXYbž'ZØf'YXYb'ni [ Åb[ `]W'g]bX''5b  
Y]bYa 'Cfh'k ]Y'BYi ZZYbž'k c'XYf'K Y]bVUi 'Y]bY''Ub[ Y'HfUX]h]cb'\Uhž  
k YfXYb'X]Y'A YbgWXYb'k Y]hYf\]b'X]Y': `Ø[ Y'XYf': fY]\Y]hi bX'XYg  
, VYfa i hg'gdØfYbž'k Å\ fYbX'g]Y'X]Y'gW]''YfbXYb': UfVYb'Y]bYg  
UVYbX`]WXYb' < ]a a Y`g' [ Yb]Y» Yb"

8YhU]`g

6Ygi WXYb'G]Y'i bg'Ui Z.'b!U[ "XY