



L ]Uca ]'YI hYbXg'h\Y`']ZY`WmWY`cZ'a cV]'Y`d\cbYg/  
k \Uh\_]bXg'cZ'YZZYWhg'k ]`h\]g'Vf]b[ 'hc` \i Uk Y]'m+  
df]a Y`&\$%, 'gWfYYb`fYd`UWf'a Ybh']bXi ghfm

L ]Uca ]'YI hYbXg'h\Y`']ZY`WmWY`cZ'a cV]'Y`d\cbYg/k \Uh\_]bXg'cZ'YZZYWhg  
k ]`h\]g'Vf]b[ 'hc` \i Uk Y]'m+`df]a Y`&\$%, 'gWfYYb`fYd`UWf'a Ybh']bXi ghfmB

5ZhYf`L ]Uca ]'a cj Yg'hck UfXg']bhYfbUh]cbU`nUh]cbž'h\YfY`UfY`gh]`i gYfg  
k \c`\Uj Y`Xci Vhg`UVci h'h\Y`i dXUhY`cZ']hg'a cV]'Y`d\cbY`gmghYa " `b`cfXYf  
hc`YI hYbX'h\Y`']ZY`WmWY`cZ'a cV]'Y`d\cbYgž`L ]Uca ]'hcXUmidfca ]gYX`hc  
dfcj ]XY`U`hcU`cZ'`a U`cf`j Yfg]cb`i d[ fUXYg`cZ'h\Y` ; cc[ `Y`5bXfc]X  
cdYfUh]b[ 'gmghYa `Zcf`h\Y`L ]Uca ]`%%H`gYf]Ygž`UbX`U`(!mYUf`gYW`f]hm  
gmghYa `i dXUhY`"

L ]Uca ]'hcXUm]ggi YX`U`dfYgg`fY`YUgY`Ubbci bW]b[ `h\Uh]'h'k ]`dfcj ]XY`h\Y  
i dWca ]b[ `L ]Uca ]`%%H`gYf]Yg`f]bWi`X]b[ `L ]Uca ]`%%H`Dfc`UbX`L ]Uca ]`%%Hk  
U`hcU`cZ'`a U`cf`j Yfg]cb`i d[ fUXYg`cZ'h\Y` ; cc[ `Y`5bXfc]X`cdYfUh]b[  
gmghYa ž`Ug`k Y`Ug`(`mYUfg`cZ`gYW`f]hm]gmghYa `i dXUhYg`"

H\Y`]bXi ghfm]dc]bhYX`ci h'h\Uh`UZhYf`L ]Uca ]'[ cYg']bhYfbUh]cbU`ž`a Ubm  
i gYfg`gh]`Uj Y`Xci Vhg`UVci h'h\Y`gmghYa `i dXUhY`cZ'h\Y`f'a cV]'Y  
d\cbYg`"5h'dfYgYbhž`ch\Yf`L ]Uca ]'a cXY`g`dfcj ]XY`Ub`Uj YfU[ Y`cZ`&a U`cf  
cdYfUh]b[ 'gmghYa `i d[ fUXYg`UbX`" `mYUfg`cZ`gYW`f]hmi dXUhYg`"

L ]Uca ]`\cdYg'h\Uh'h\fc] [ \`h\]g'dc`]Wmž`L ]Uca ]`%%H`gYf]Yg`i gYfg`k ]`  
\Uj Y`U`VYhhYf`i gYf`YI dYf]YbWf`UbX`\][ \Yf`]bZcfa`Uh]cb`gYW`f]hm"  
5`h\ci [ \`h\]g'dc`]WmXcYg`bch`Wc] Yf`ch\Yf`gYf]Yg`cZ`dfcXi`Whgž`L ]Uca ]  
VY`]Yj Yg`h\]g`]g`U`dcg]hj Y`W`Ub[ Y`"

G\Ub`K Yb\Ucž`YUX`cZ`dfcXi`Wh`UbX`hYW`bc`c[ micZ`L ]Uca ]`b`hYfbUh]cbU`ž  
gU]X`h\Uh'k ]h\`h\Y`Wc]bh]bi`ci`g`]bbc]Uh]cb`cZ`ga`Ufhd\cbY`\UfXk`UfYž`h\Y  
`]ZY`WmWY`cZ`ga`Ufhd\cbYg`]g[ fUXi`U`mYI`hYbX]b[ ž`k`\]W`a`YUbg`h\Uh  
i`gYfg`Xc`bch`bYX`hc`fYd`UWf`h\Y]f`d\cbYg`ZfYei`Ybh`m`H\YfYZcfYž`a`cfY  
UbX`a`cfY`Wc]bgi`a`Yfg`dUm`UhhYbh]cb`hc`h\Y`i`dXUhYX`ZfYei`YbWm]cZ  
cdYfUh]b[ 'gmghYa`g`UbX`bYk`ZYUhi`fYg`"



L ]Uca ]'gU]X`h\Uh]h'k ]`'dfcj ]XY`h\ fYY`a U`cf'j Yfg]cb`i d[ fUXYg`cZ`h\Y  
; cc[ `Y`5bXfc]X`cdYfUh]b[ `gmghYa `hc`Zi fh\Yf`Yi hYbX`h\Y` ]ZY`WmWY`cZ  
L ]Uca ]`d\cbYg`"I gYfg`k ]`'Wcbh]bi Y`hc`i gY`Yi ]gh]b[ `L ]Uca ]`d\cbYg  
k ]h\ci h`ZfYei Ybh`di fW\ UgYg`cZ`bYk `dfcXi W`hgZ`UbX`h\Ym`WUb`U`gc`Yb`em  
h\Y`UhYgh`cdYfUh]b[ `gmghYa `UbX`fY`UhYX`Zi bW]cbg`"5h`h\Y`gUa Y`h]a YZ`]h  
U`gc`dfcj ]XYg`i gYfg`k ]h\`(`mYUfg`cZ`gYW`f]hmi dXUhYg`hc`Wcbh]bi Y`hc  
Ybgi fY`h\Uh`a`cV]Y`d\cbYg`UfY`gi V`YWh`hc`\ ][\Yf`gYW`f]hmidfchYWh]cb`"

ϕ`UXX]h]cbZ`L ]Uca ]]'g`Yj U`i Uh]b[ `h\Y`dcgg]V`]'hmicZ]bhfcXi W]b[ `a`cfY  
L ]Uca ]'ga Ufhd\cbYg]bhc`h\Y` ; cc[ `Y`5bXfc]X`cdYfUh]b[ `gmghYa  
i d[ fUXY`UbX`gYW`f]hmi dXUhY`dc`]Wm`<ck Yj YfZ`h\Y`Uj U]UV`]'hmicZ; cc[ `Y  
5bXfc]X`cdYfUh]b[ `gmghYa `i d[ fUXYg`UbX`ZYUhi fYg`j Uf]Yg`VmidfcXi W`h  
a`cXY`UbX`a`Uf`\_Yh`"

<ck`XcYg`h\]g`UZZYWh`h\Y`\i Uk Y]'m+`df]a Y`&\$%, `gWfYYb`fYd`UW`a Ybh  
]bXi ghfm3

K ]h\`h\Y`fUd]X`i dXUh]b[ `UbX`gY` ]b[ `cZ`ga Ufh`d\cbYgZ`Ubch\Yf` ]bXi ghfm  
UggcW]UhYX`k ]h\`]h\`h\Y`a`cV]Y`d\cbY`UWW`ggcf]Yg` ]bXi ghfm`Ug`U`gc  
[ fck`b`fUd]X`m`H\Y`gc!WU`YX`a`cV]Y`d\cbY`UWW`ggcf]Yg`UfY`k` \Uh`dYcd`Y  
i gi U`m`WU`h\Y`gYWcbXUfmidfcXi W`hg`cZ`a`cV]Y`d\cbYgZ`YgdYW]U`m`k` \Yb  
h\Y`]D\cbY`ga Ufh`d\cbYg`UfY`dcdi `Uf`bck UXUmgZ`Wcbgi a`Yfg`\Uj Y`U  
\i [ Y`XYa`UbX`Zcf`\i Uk Y]'m+`df]a Y`&\$%, `gWfYYb`fYd`UW`a Ybh`H\Y  
bi a`VYf`cZ`ga Ufhd\cbYg`cb`h\Y`a`Uf`\_Yh`h\Uh]g` ]bWfYUg]b[ `mYUf`Vm`mYUf  
k ]`gh]a i`UhY`dYcd`Yf]g`XYa`UbX`Zcf`\i Uk Y]'m+`df]a Y`&\$%, `gWfYYb  
fYd`UW`a Ybh`H\Y`i dghfYUa`fUk`a`UhYf]U`g`cZ`h\Y`\i Uk Y]'m+`df]a Y`&\$%,  
gWfYYb`fYd`UW`a Ybh]bXi ghfm`W`U]b`a`U]b`m]bWi XY`d`Ugh]WgZ`h\]i a  
gU`hgZ`]bhY[ fUhYX`W]fW` ]hgZ`dcg]hj Y`UbX`bY[ Uh]j Y`a`UhYf]U`gZ`Wcb`bYWh`c`fgZ  
YhWZ`UbX`h\Y`Xck bghfYUa`UfY`a`cV]Y`d\cbY`VfUbXgZ`a`cV]Y`d\cbY  
gY`YfgZ`W`UbbY`gY`Yfg`UbX`cdYfUhc`fg`"C`f]k` \]n`fG`Ybn`Yb`8`cb[ M  
HYb[ ZY]'9`YWhfcb]Wg`7`c`"Z`@hXk` ]g`U`dfcZYgg]cbU` ]D\cbYZ` ]DUXZ` ]A UWZ`A UW  
6cc`\_Z`L ]Uca ]Z`<i Uk Y]Z`GUa gi b[ Z`GcbmZ`@` Z`5GI`G`fYdU]f`dUfhg`UbX  
fYdU]f`hcc`g`gi`dd`Yf`": cf`hY`W`b]WU`Wcbgi`h]b[ `cf`a`cfY` ]bZcfa`Uh]cb  
UVci h`\i Uk Y]'m+`df]a Y`&\$%, `gWfYYb`fYd`UW`a YbhZ`gYbX`Ub`Ya`U`  
hc. [\]bZc4`cf\]k`\\]n`Wca`"](#)

5bU`mg]g`cZ`h\Y`W`ffYbh`a`Uf`\_Yh`XYa`UbX`ghUhi`g`cZ`h\Y`[ `cVU`\i Uk Y]'m+  
df]a Y`&\$%, `gWfYYb`fYd`UW`a Ybh]bXi ghfm



H\Y`[ `cVU`dcdi `Uh]cb`cZ`bYUf`m+ `V]`]cb`dfcj ]XYg`h\Y`VUg]g`Zcf`h\Y`  
Wcbh]bi ci g`[ fck`h`cZ`h\Y`a`cV]`Y`d`cbY`a`Uf`\_Yh`z`UbX`k`]h`h\Y`  
Wcbh]bi ci g`]a`dfcj`Ya`Ybh`cZ`dcdi`Uh]cb`ei`U`]hm`z`\Uj`]b`[ `ga`Ufh`d`cbYg`  
\Ug`VY`Wca`Y`Ub`]bYj`]hUV`Y`Wlc`]W`Zcf`dYcd`Y`hc`a`YY`h`h\Y`]f`dYfgcbU`  
Wca`a`i`b`]WUh]cb`b`YY`Xg`"5W`WcfX]b[ `hc`ghUh]gh]Wg`z`Ug`cZ`Ubi`Ufm`đ`bY`&\$&%ž  
[ `cVU`a`cV]`Y`d`cbY`g\]da`Ybhg`k`YfY`&"( , %`V]`]cb`i`b`]hg`z`U`mY`Uf!`cb!`mY`Uf`  
]b`WfY`UgY`cZ`&%" ) ı "

K ]h`h\Y`Wcbh]bi ci g`UXj`UbW`a`Ybh`cZ`hY`Wlc`bc`c`[ m`z`dYcd`Y`\Uj`Y`\][ \Yf`  
UbX`\][ \Yf`XYa`UbXg`Zcf`ei`U`]hm`UbX`Yb`c`ma`Ybh`z`UbX`a`cgh`Wcbgi`a`Yfg`  
\Uj`Y`VY`[ i`b`hc`dUm`UhY`bh]cb`hc`h\Y`ei`U`]hm`UbX`Zi`bW]cb`cZ`\i`Uk`Y`]m+`  
df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`"H\Y`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`  
fYd`UW`a`Ybh`Zc`ck`g`h\Y`Wcbh]bi ci g`XYj`Y`cda`Ybh`cZ`a`cV]`Y`d`cbY`  
dfcXi`W`hg`ZUghYf`UbX`ZUghYf`"5W`WcfX]b[ `hc`ghUh]gh]Wg`z`Ug`cZ`Ubi`Ufm`đ`m`  
&\$&%ž`[ `cVU`g\]da`Ybhg`cZ`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`  
UfY`Uddfcl`]a`UhY`m`&") +- `V]`]cb`d`]YW`g"

đ`hYfa`g`cZ]a`dcfh`UbX`Yi`dcfh`z`UW`WcfX]b[ `hc`ghUh]gh]Wg`z`h\Y`]a`dcfhj`U`i`Y`  
cZ`7\]bYgY`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`]b`&\$%-`k`Ug`  
I`G`+`\$`%`a`j`]cb`z`U`mY`Uf!`cb!`mY`Uf`XYWfYUgY`cZ`&`&`ı`ž`UbX`h\Y`Yi`dcfh`  
j`U`i`Y`k`Ug`I`G`&\$`\*`&(`V]`]cb`z`U`mY`Uf!`cb!`mY`Uf`]b`WfYUgY`cZ`\*", (`ı`/Ug`cZ`  
Ubi`Ufm`Bcj`Ya`VYf`&\$&\$ž`h\Y`]a`dcfhj`U`i`Y`cZ`7\]bYgY`\i`Uk`Y`]m+`df]a`Y`  
&\$%, `gWfYYb`fYd`UW`a`Ybh`k`Ug`)", , `6]`]cb`ı`"G`"Xc`Ufg`z`UbX`h\Y`Yi`dcfh`  
j`U`i`Y`]g`%, "-`\*`-`V]`]cb`ı`"G`"Xc`Ufg"

5bU`mg]g`cZ`h\Y`XYa`UbX`Zcf`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`  
]b`h\Y`a`Uf`\_Yh`igY`[a`Ybhg`cZ`h\Y`a`cV]`Y`d`cbY`UW`Wggcf]Yg`]bXi`ghfm`

: fca`h\Y`dYfgdYWh]j`Y`cZ`[ `cVU`a`cV]`Y`d`cbY`UW`Wggcf]Yg`]a`Uf`\_Yh`  
XYa`UbX`z`UW`WcfX]b[ `hc`ghUh]gh]Wg`z`Ug`cZ`Ubi`Ufm`A`UfW`ı`&\$&\$ž`7\]bU`Pfg`  
Yi`dcfh`XYa`UbX`Zcf`ga`Ufh`d`cbY`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`  
fYd`UW`a`Ybh`k`Ug`, -, `a`j`]cb`z`U`mY`Uf!`cb!`mY`Uf`XYWfYUgY`cZ`+"(-ı`"H\Y`  
XYa`UbX`Zcf`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`]g`WcgY`m`  
fY`UhY`X`hc`h\Y`ci`hdi`h`cZ`a`cV]`Y`d`cbY`g`"5W`WcfX]b[ `hc`ghUh]gh]Wg`z`Ug`cZ`  
5df]!đ`bY`&\$&\$ž`h\Y`Yi`dcfh`XYa`UbX`Zcf`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`  
fYd`UW`a`Ybh`]b`7\]bU`]g`%" - `V]`]cb`": fca`h\Y`dYfgdYWh]j`Y`cZ`a`Uf`\_Yh`  
XYa`UbX`Zcf`\i`Uk`Y`]m+`df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`z`UW`WcfX]b[ `hc`  
ghUh]gh]Wg`z`Ug`cZ`đ`m`GYdhYa`VYf`&\$&\$ž`h\Y`Yi`dcfh`XYa`UbX`Zcf`\i`Uk`Y`]m+`  
df]a`Y`&\$%, `gWfYYb`fYd`UW`a`Ybh`]b`7\]bU`k`Ug`%"&\$+`V]`]cb`"đ`hYfa`g`cZ`



\i Uk Y]m+`df]a Y`&\$%, `gWfYYb`fYd`UW`a Ybh'g\]da Ybhgž'UWŦcfX]b[ `hc  
ghUh]gh]Wgž'Ug`cZ`&\$%- ž'h\Y`Ubbi U`g\]da Ybh'cZ`7\]bYgY`\i Uk Y]m+`df]a Y  
&\$%, `gWfYYb`fYd`UW`a Ybh'k Ug`) "" , `V]]cbž'U`mYUf!cb!mYUf`]bWfYUgY`cZ  
' "" | "

H\Y`\i Uk Y]m+`df]a Y`&\$%, `gWfYYb`fYd`UW`a Ybh'gi dd`]Yf

[Cf\]k \\]n`fG\Ybn\Yb`8cb\[ M`HYb\[ ZY\]`9`YWhfcb\]Wg`7c"ž`@XŁ`\]g`U](#)  
dfcZYgg]cbU`]D\cbYž`]DUXž`]A UWž`A UW6cc\_ž`L]Uca ]ž`<i Uk Y]ž`GUa gi b[ ž  
Gcbmž`@, ž`5GI G`fYdU]f`dUfhg`UbX`fYdU]f`hcc`g`gi dd`]Yf`Cf]k \]n`hYUa  
U]a g`hc`dfcj ]XY`h\Y`VYgh`ei U`]hm`WŦ`d\cbY`fYd`UW`a Ybh`dUfhg`UbX  
fYdU]f`hcc`g`hc`U`Ŧ`W`ghca Yfg`"K Y`dfcj ]XY`Ŧca`dfY\Ybg]] Y`gc`i h]cbg`Zcf  
WŦ`d\cbYž`X][ ]hU`XYj ]W`gž`Ŧca`di hYf`fYdU]f`g\cdg`k ]h\`dck YfZi`Ŧ`UbX  
\UbXm`WŦ`d\cbY`fYdU]f`dUW`U[ Ygž`fYdU]f`hcc`gž`UbX`fYdU]f`a`UW`]bYg`  
6fck gY`ci f`dfcXi`Wh`WUhY[ cfm`hc`gY`YWh`Ub`]hYa`mci`Ŧ`\_Y`cf`ŦcbhUWh`i g  
Zcf`k \c`YgU`Y`UbX`X]ghf]Vi h]cb`]ggi Yg`j ]U. [\]bZc4cf\]k \\]n`Ŧca`"](#)