

Table 4 OLS regressions of profit economies of diversification (profit premium) on firm-level characteristics

| | Loan Diversification | | Deposit Diversification | | Asset Diversification | | Geographical Diversification | |
|-----------------------------|-------------------------|---------|----------------------------|----------|--------------------------|-----------|---------------------------------|-----------|
| Constant | -0.548* | -0.474 | -0.486* | -0.403 | -0.147** | -0.164** | -0.282*** | -0.266*** |
| | [1.70] | [1.60] | [1.73] | [0.70] | [1.98] | [2.07] | [2.96] | [2.86] |
| Big Four | -0.100 | -0.118* | -0.168 | -0.191 | -0.034** | -0.029* | 0.035*** | 0.039*** |
| | [1.38] | [1.67] | [0.87] | [0.97] | [2.26] | [1.93] | [3.80] | [3.86] |
| State ownership | -0.018 | -0.020 | -0.138** | -0.135** | -0.026*** | -0.027*** | -0.007 | -0.007 |
| | [0.53] | [0.58] | [2.29] | [2.26] | [4.03] | [4.07] | [1.31] | [1.45] |
| Foreign ownership | 0.016** | 0.010** | 0.010** | 0.014** | 0.019*** | 0.018*** | 0.004 | 0.005 |
| | [2.51] | [2.32] | [2.11] | [2.15] | [2.98] | [2.95] | [0.91] | [1.23] |
| Loan loss provisions/assets | -0.928 | | -1.702 | | -0.398** | | -0.170 | |
| | [1.41] | | [1.25] | | [2.47] | | [1.34] | |
| Nonperforming loans/assets | | -0.065 | | -0.017 | | -0.002 | | -0.017 |
| | | [0.68] | | [0.13] | | [0.10] | | [1.56] |
| ln(assets) | 0.067 | 0.060 | -0.186 | -0.178 | -0.041** | -0.043** | 0.030** | 0.029** |
| | [0.66] | [0.58] | [0.72] | [0.69] | [2.16] | [2.20] | [2.43] | [2.33] |
| Squared ln(assets) | -0.003 | -0.003 | 0.006 | 0.006 | 0.001** | 0.002** | -0.001** | -0.001** |
| | [0.87] | [0.83] | [0.68] | [0.67] | [2.42] | [2.42] | [2.37] | [2.30] |
| Equity/assets | 0.206** | 0.166* | 0.217 | 0.147 | 0.016 | 0.001 | 0.057*** | 0.050*** |
| | [2.10] | [1.74] | [0.88] | [0.61] | [0.78] | [0.00] | [3.77] | [3.95] |
| Conglomerate affiliated | 0.010 | 0.011 | 0.072* | 0.072* | 0.003 | 0.003 | -0.013*** | -0.012*** |
| | [0.50] | [0.57] | [1.82] | [1.78] | [0.78] | [0.79] | [4.22] | [4.10] |
| Hyper-regulated period | 0.001 | 0.001 | 0.049 | 0.051 | -0.019*** | -0.019*** | 0.003* | 0.004* |
| | [0.02] | [0.03] | [1.25] | [1.24] | [6.42] | [6.43] | [1.65] | [1.76] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.11 | 0.11 | 0.04 | 0.04 | 0.20 | 0.19 | 0.14 | 0.13 |
| Adj R-square | 0.09 | 0.09 | 0.02 | 0.02 | 0.19 | 0.17 | 0.12 | 0.12 |
| F-statistics | 11.25 | 12.79 | 3.51 | 4.42 | 14.51 | 13.58 | 6.36 | 6.49 |

Table 4 presents the ordinary least squares (OLS) regressions of profit economies of diversification (i.e., profit premium) on ownership variables, risk proxies, size variables (including both ln(assets) and squared term of ln(assets)), conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The profit premiums in the first, second, third and fourth paired columns are calculated based on decompositions of loan, deposit, asset, and geographic portfolios, respectively, and these decompositions follow the same definitions as described in previous tables. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

Table 5 OLS Regressions of cost economies of diversification (cost discount) on firm-level characteristics

| | Loan Diversification | | Deposit Diversification | | Asset Diversification | | Geographical Diversification | |
|-----------------------------|-------------------------|-----------|----------------------------|----------|--------------------------|-----------|---------------------------------|-----------|
| Constant | -0.098* | -0.070* | -0.097* | -0.051** | -0.656* | -0.732* | -1.640*** | -1.918*** |
| | [1.74] | [1.73] | [1.94] | [1.97] | [1.67] | [1.71] | [2.82] | [2.88] |
| Big Four | -0.048** | -0.043* | -0.279* | -0.263* | -0.096** | -0.068* | 0.298* | 0.210* |
| | [2.00] | [1.88] | [1.88] | [1.69] | [2.07] | [1.77] | [1.96] | [1.69] |
| State ownership | -0.045*** | -0.047*** | -0.107 | -0.104 | -0.099* | -0.105* | -0.406** | -0.423** |
| | [2.92] | [3.03] | [1.03] | [0.99] | [1.71] | [1.78] | [2.32] | [2.40] |
| Foreign ownership | 0.033** | 0.037*** | 0.014** | 0.013** | 0.099** | 0.103** | 0.847*** | 0.848*** |
| | [2.42] | [2.78] | [2.15] | [2.14] | [2.55] | [2.42] | [4.67] | [4.57] |
| Loan loss provisions/assets | | | -1.466 | | -3.105*** | | -8.369** | |
| | | | [0.91] | | [2.73] | | [2.10] | |
| Nonperforming loans/assets | | -0.084*** | | -0.019 | | -0.118 | | -0.174 |
| | | [2.76] | | [0.14] | | [1.16] | | [0.29] |
| ln(assets) | -0.100* | -0.100* | -0.536** | -0.541** | -0.113 | -0.120 | -1.548*** | -1.574*** |
| | [1.94] | [1.92] | [2.11] | [2.13] | [0.88] | [0.92] | [3.19] | [3.24] |
| Squared ln(assets) | 0.003* | 0.003* | 0.018** | 0.018** | 0.004 | 0.004 | 0.055*** | 0.055*** |
| | [1.93] | [1.87] | [2.22] | [2.23] | [0.98] | [0.97] | [3.51] | [3.54] |
| Equity/assets | 0.077 | 0.038 | -0.175 | -0.235 | 0.036 | -0.087 | -0.444 | -0.780 |
| | [1.46] | [0.80] | [0.58] | [0.79] | [0.28] | [0.61] | [0.88] | [1.54] |
| Conglomerate affiliated | 0.007 | 0.005 | -0.095 | -0.095 | 0.018 | 0.014 | 0.393*** | 0.387*** |
| | [0.72] | [0.46] | [1.65] | [1.62] | [0.50] | [0.40] | [3.78] | [3.71] |
| Hyper-regulated period | -0.043*** | -0.046*** | -0.028 | -0.030 | -0.085*** | -0.092*** | -0.188** | -0.202** |
| | [6.19] | [6.45] | [0.72] | [0.73] | [4.35] | [4.28] | [2.28] | [2.32] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.21 | 0.20 | 0.04 | 0.03 | 0.12 | 0.10 | 0.32 | 0.32 |
| Adj R-square | 0.19 | 0.18 | 0.02 | 0.01 | 0.11 | 0.08 | 0.31 | 0.30 |
| F-statistics | 24.77 | 39.00 | 2.12 | 2.36 | 6.32 | 6.25 | 37.50 | 36.39 |

Table 5 presents the ordinary least squares (OLS) regressions of cost economies of diversification (cost discount) on ownership variables, risk proxies, size variables (including both ln(assets) and squared term of ln(assets)), conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The cost discounts in the first, second, third and fourth paired columns are calculated based on decompositions of loan, deposit, asset, and geographical portfolios, respectively, and these decompositions follow the same definitions as described in previous tables. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

Table 6 Summary statistics of Focus Indices of loan, deposit, asset, and geographic portfolios

| | Obs. | Mean | Median | Std. Dev. | Minimum | Maximum |
|---|------|-------|--------|-----------|---------|---------|
| <i>Summary Statistics for all observations</i> | | | | | | |
| Loan Focus Index | 464 | 0.428 | 0.415 | 0.086 | 0.282 | 0.700 |
| Deposit Focus Index | 464 | 0.530 | 0.401 | 0.122 | 0.273 | 1.000 |
| Asset Focus Index | 464 | 0.420 | 0.520 | 0.090 | 0.281 | 0.979 |
| Geographic Focus Index | 464 | 0.866 | 1.000 | 0.286 | 0.216 | 1.000 |
| <i>Summary statistics for small banks: assets < US \$1 billion</i> | | | | | | |
| Loan Focus Index | 100 | 0.426 | 0.412 | 0.082 | 0.298 | 0.609 |
| Deposit Focus Index | 100 | 0.600 | 0.446 | 0.179 | 0.335 | 1.000 |
| Asset Focus Index | 100 | 0.484 | 0.568 | 0.135 | 0.307 | 0.979 |
| Geographic Focus Index | 100 | 1.000 | 1.000 | 0.000 | 1.000 | 1.000 |
| <i>Summary statistics for medium banks: US \$1 billion < assets < US \$20 billion</i> | | | | | | |
| Loan Focus Index | 261 | 0.411 | 0.397 | 0.075 | 0.282 | 0.610 |
| Deposit Focus Index | 261 | 0.528 | 0.383 | 0.098 | 0.273 | 0.941 |
| Asset Focus Index | 261 | 0.393 | 0.528 | 0.056 | 0.281 | 0.564 |
| Geographic Focus Index | 261 | 0.970 | 1.000 | 0.142 | 0.270 | 1.000 |
| <i>Summary statistics for large banks: assets > US \$20 billion</i> | | | | | | |
| Loan Focus Index | 103 | 0.474 | 0.471 | 0.098 | 0.299 | 0.700 |
| Deposit Focus Index | 103 | 0.470 | 0.428 | 0.061 | 0.336 | 0.593 |
| Asset Focus Index | 103 | 0.428 | 0.466 | 0.070 | 0.299 | 0.644 |
| Geographic Focus Index | 103 | 0.470 | 1.000 | 0.342 | 0.216 | 1.000 |

Table 6 presents the summary statistics of Focus Indices, and decompositions of loan, deposit, asset and geographical portfolios follow the same definitions as in Table 1. Summary statistics of subsamples of Chinese banks by size are also presented.

Table 7 OLS regressions of ROA on Focus Indices and ownership.

| | Dependent Variable: ROA | | | | | | | |
|---------------------------------------|-------------------------|----------|-----------------|----------|-----------------|-----------|-----------------|-----------|
| | Loan | | Deposit | | Asset | | Geographical | |
| | Diversification | | Diversification | | Diversification | | Diversification | |
| Constant | -0.024 | -0.019 | -0.021 | -0.020 | -0.019 | -0.011 | -0.029 | -0.023 |
| | [0.45] | [0.36] | [0.44] | [0.43] | [0.37] | [0.22] | [0.52] | [0.42] |
| Big Four | -0.010 | -0.008 | -0.008 | -0.008 | 0.005 | 0.003 | -0.085*** | -0.072*** |
| | [1.56] | [1.36] | [0.98] | [0.97] | [0.78] | [0.58] | [4.24] | [4.16] |
| State ownership | 0.002 | 0.001 | 0.005 | 0.005 | 0.001 | 0.001 | -0.001 | -0.001 |
| | [0.28] | [0.07] | [0.58] | [0.60] | [0.21] | [0.12] | [0.88] | [0.57] |
| Foreign ownership | 0.004** | 0.004** | 0.010* | 0.009** | 0.005* | 0.003 | 0.012 | 0.011 |
| | [2.35] | [2.32] | [1.93] | [1.98] | [1.86] | [1.28] | [1.40] | [1.15] |
| Focus Index | 0.004** | 0.002** | 0.007*** | 0.006*** | 0.002** | 0.007* | 0.002 | 0.002 |
| | [2.39] | [2.16] | [2.62] | [2.60] | [2.32] | [1.84] | [0.77] | [0.68] |
| Focus Index × Big Four | 0.021* | 0.020* | 0.017 | 0.019 | -0.011 | -0.005 | 0.376*** | 0.321*** |
| | [1.72] | [1.68] | [0.89] | [0.95] | [0.76] | [0.35] | [4.03] | [4.06] |
| Focus Index × State ownership | -0.007 | -0.003 | -0.012 | -0.013 | -0.004 | -0.003 | -0.001 | -0.001 |
| | [0.35] | [0.14] | [0.63] | [0.64] | [0.31] | [0.20] | [0.20] | [0.10] |
| Focus Index × Foreign ownership | -0.008** | -0.009** | -0.007* | -0.003** | -0.005** | -0.011*** | -0.005** | -0.004** |
| | [2.31] | [2.39] | [1.69] | [2.30] | [2.31] | [2.63] | [2.57] | [2.38] |
| Focus Index × Conglomerate affiliated | -0.006* | -0.007* | -0.006* | -0.006* | -0.001** | -0.004 | -0.001* | -0.002* |
| | [1.70] | [1.86] | [1.90] | [1.85] | [2.10] | [1.51] | [1.66] | [1.78] |
| Loan loss provisions/assets | -0.032 | | -0.029 | | -0.034 | | -0.044 | |
| | [0.72] | | [0.67] | | [0.65] | | [0.94] | |
| Nonperforming loans/assets | | -0.005 | | -0.005 | | -0.007* | | -0.004 |
| | | [1.58] | | [0.96] | | [1.95] | | [1.10] |
| ln(assets) | 0.005 | 0.004 | 0.004 | 0.004 | 0.004 | 0.003 | 0.006 | 0.005 |
| | [0.67] | [0.62] | [0.66] | [0.68] | [0.64] | [0.54] | [0.77] | [0.69] |
| Squared ln(assets) | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 |
| | [0.66] | [0.62] | [0.65] | [0.68] | [0.62] | [0.53] | [0.75] | [0.69] |
| Equity/assets | 0.016 | 0.014 | 0.017 | 0.016 | 0.016 | 0.015 | 0.018 | 0.015 |
| | [1.53] | [1.61] | [1.17] | [1.21] | [1.32] | [1.43] | [1.58] | [1.60] |
| Conglomerate affiliated | 0.002 | 0.003 | 0.003 | 0.003 | -0.001 | -0.002 | -0.002 | -0.002 |
| | [0.70] | [0.88] | [0.39] | [0.41] | [0.13] | [0.47] | [1.08] | [1.14] |
| Hyper-regulated period | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 | 0.001 |
| | [1.30] | [1.34] | [1.23] | [1.19] | [0.91] | [1.04] | [1.42] | [1.39] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.24 | 0.24 | 0.24 | 0.24 | 0.24 | 0.24 | 0.25 | 0.24 |
| Adj R-square | 0.21 | 0.22 | 0.21 | 0.21 | 0.21 | 0.22 | 0.22 | 0.22 |
| F-statistics | 3.43 | 3.47 | 4.13 | 4.78 | 4.19 | 4.83 | 11.10 | 12.67 |

Table 7 presents the ordinary least squares (OLS) regressions of return on assets (ROA) on Focus Indices, ownership variables, conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), the interaction terms between Focus Indices and ownership variables, between Focus Indices and conglomerate affiliation dummy, and control variables including risk proxies, size variables (including both ln(assets) and squared term of ln(assets)), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The Focus Index in the first paired columns represents the loan Focus Index, and the same Focus Index is also used to construct the interaction terms between Focus Indices and other variables. The Focus Indices in the second, third, and four paired columns represent deposit Focus Index, asset Focus Index, geographic Focus Index. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

Table 8 OLS regressions of total expenses/total assets on Focus Indices and ownership

| | Dependent Variable: Total Expenses/Total Assets | | | | | | | |
|---------------------------------------|---|---------------------|---------------------|---------------------|---------------------|---------------------|---------------------|---------------------|
| | Loan | | Deposit | | Asset | | Geographical | |
| | Diversification | | Diversification | | Diversification | | Diversification | |
| Constant | -0.147*** [2.76] | -0.151*** [2.81] | -0.136** [2.49] | -0.137** [2.51] | -0.167*** [3.25] | -0.178*** [3.38] | -0.125** [2.48] | -0.130** [2.54] |
| Big Four | 0.001 [0.05] | 0.001 [0.05] | 0.039*** [3.01] | 0.043*** [3.38] | 0.028** [2.29] | 0.030** [2.41] | 0.011 [0.27] | 0.001 [0.03] |
| State ownership | 0.027 [1.54] | 0.028 [1.61] | -0.031** [2.09] | -0.035** [2.40] | 0.006 [0.46] | 0.006 [0.45] | -0.004 [1.10] | -0.005 [1.37] |
| Foreign ownership | 0.027* [1.95] | 0.029* [2.06] | 0.001** [2.08] | 0.003** [2.34] | 0.023** [2.02] | 0.025** [2.22] | 0.002** [2.14] | 0.005** [2.31] |
| Focus Index | -0.012 [0.59] | -0.014 [0.68] | -0.025 [1.50] | -0.029* [1.80] | 0.039** [2.09] | 0.043** [2.27] | -0.003 [0.48] | -0.002 [0.32] |
| Focus Index × Big Four | -0.014 [0.61] | -0.013 [0.56] | -0.073*** [2.75] | -0.079*** [3.14] | -0.054* [1.91] | -0.062** [2.13] | -0.001 [0.01] | -0.050 [0.30] |
| Focus Index × State ownership | -0.039 [1.02] | -0.042 [1.10] | 0.087*** [2.86] | 0.095*** [3.21] | -0.009 [0.32] | -0.009 [0.30] | -0.021*** [3.08] | -0.022*** [3.30] |
| Focus Index × Foreign ownership | 0.052* [1.66] | 0.056* [1.77] | 0.017** [2.10] | 0.025** [2.57] | 0.039* [1.67] | 0.044* [1.94] | 0.005** [2.30] | 0.003** [2.19] |
| Focus Index × Conglomerate affiliated | 0.010* [1.72] | 0.012* [1.85] | 0.021* [1.84] | 0.022** [2.02] | 0.010* [1.61] | 0.015* [1.92] | 0.007** [2.32] | 0.007** [2.23] |
| Loan loss provisions/assets | 0.085 [1.43] | | 0.054 [0.95] | | 0.070 [1.21] | | 0.073 [1.26] | |
| Nonperforming loans/assets | | 0.002 [0.39] | | 0.009 [1.26] | | 0.007 [1.27] | | 0.001 [0.01] |
| ln(assets) | 0.021*** [3.10] | 0.021*** [3.13] | 0.021*** [3.00] | 0.022*** [3.07] | 0.022*** [3.38] | 0.023*** [3.46] | 0.018*** [2.67] | 0.018*** [2.75] |
| Squared ln(assets) | -0.001*** [3.18] | -0.001*** [3.19] | -0.001*** [3.04] | -0.001*** [3.10] | -0.001*** [3.46] | -0.001*** [3.52] | -0.001*** [2.68] | -0.001*** [2.74] |
| Equity/assets | 0.006 [0.79] | 0.009 [1.30] | -0.004 [0.48] | -0.002 [0.25] | -0.002 [0.24] | 0.002 [0.20] | 0.003 [0.43] | 0.007 [0.87] |
| Conglomerate affiliated | -0.008 [1.13] | -0.008 [1.24] | -0.013** [2.23] | -0.013** [2.36] | 0.001 [0.03] | 0.002 [0.31] | 0.005 [1.06] | 0.004 [0.99] |
| Hyper-regulated period | 0.011*** [7.61] | 0.011*** [7.62] | 0.012*** [8.53] | 0.012*** [8.51] | 0.012*** [8.59] | 0.012*** [8.39] | 0.011*** [7.81] | 0.011*** [7.64] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.27 | 0.26 | 0.29 | 0.29 | 0.29 | 0.29 | 0.28 | 0.28 |
| Adj R-square | 0.24 | 0.24 | 0.27 | 0.27 | 0.27 | 0.27 | 0.26 | 0.26 |
| F-statistics | 13.43 | 13.31 | 14.17 | 14.01 | 13.17 | 12.75 | 14.22 | 14.32 |

Table 8 presents the ordinary least squares (OLS) regressions of total expenses/total assets on Focus Indices, ownership variables, conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), the interaction terms between Focus Indices and ownership variables, between Focus Indices and conglomerate affiliation dummy, and control variables including risk proxies, size variables (including both ln(assets) and squared term of ln(assets)), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The Focus Index in the first paired columns represents the loan Focus Index, and the same Focus Index is also used to construct the interaction terms between Focus Indices and other variables. The Focus Indices in the second, third, and four paired columns represent deposit Focus Index, asset Focus Index, geographic Focus Index. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

Table 9 OLS regressions of Risk on Focus Indices and ownership

| | Dependent Variable: Loan Loss Provisions/Assets | | | | Dependent Variable: Nonperforming Loans/Assets | | | |
|---------------------------------------|---|-------------------------|-----------------------|---------------------------|--|-------------------------|-----------------------|---------------------------|
| | Loan Diversification | Deposit Diversification | Asset Diversification | Geography Diversification | Loan Diversification | Deposit Diversification | Asset Diversification | Geography Diversification |
| Constant | -0.064 [1.35] | -0.026 [0.54] | -0.062 [1.23] | -0.065 [1.27] | 0.625* [1.89] | 0.008 [0.03] | 0.889** [2.57] | 0.850** [2.48] |
| Big Four | 0.007 [0.46] | 0.035* [1.95] | 0.017 [0.97] | 0.160*** [3.34] | 0.231** [2.24] | 0.165 [1.39] | 0.148 [1.31] | 1.596*** [5.39] |
| State ownership | 0.022 [1.34] | 0.039** [2.00] | 0.016 [1.03] | 0.011 [1.64] | 0.183** [2.58] | 0.193*** [2.59] | 0.146** [2.17] | 0.024 [1.57] |
| Foreign ownership | 0.019* [1.86] | 0.007* [1.93] | 0.011* [1.82] | 0.032 [1.74] | 0.051 [2.39] | 0.410*** [7.66] | 0.355** [2.57] | 0.056 [2.61] |
| Focus Index | -0.033 [1.57] | -0.037* [1.76] | -0.012 [0.65] | -0.015* [1.90] | -0.258** [2.34] | -0.244** [2.49] | -0.531*** [4.67] | -0.032 [0.89] |
| Focus Index × Big Four | -0.009 [0.27] | -0.099*** [2.88] | -0.064* [1.82] | -0.679*** [3.18] | -0.284 [1.47] | -0.075 [0.31] | -0.494* [1.82] | -6.751*** [5.26] |
| Focus Index × State ownership | 0.050 [1.26] | 0.085** [2.20] | 0.038 [1.07] | 0.016** [2.00] | 0.441*** [2.71] | 0.396** [2.56] | 0.388** [2.39] | -0.024 [0.88] |
| Focus Index × Foreign ownership | 0.050 [1.60] | 0.016 [0.78] | 0.017 [0.66] | 0.032 [0.75] | 0.062 [0.20] | 0.861*** [9.08] | 0.920*** [3.11] | 0.010 [0.10] |
| Focus Index × Conglomerate affiliated | 0.025 [1.33] | 0.022* [1.66] | 0.060*** [4.16] | 0.005 [0.92] | 0.081 [0.77] | 0.051 [0.56] | 0.162 [1.62] | 0.093*** [2.79] |
| ln(assets) | 0.005 [0.80] | 0.004 [0.64] | 0.006 [0.92] | 0.009 [1.28] | -0.050 [1.17] | 0.032 [0.86] | -0.074* [1.71] | -0.089** [1.97] |
| Squared ln(assets) | 0.001 [0.35] | 0.001 [0.19] | 0.001 [0.49] | 0.001 [0.90] | 0.001 [0.88] | -0.001 [1.14] | 0.002 [1.51] | 0.002* [1.71] |
| Equity/assets | 0.042*** [4.34] | 0.034*** [3.22] | 0.050*** [5.23] | 0.045*** [4.44] | -0.040 [0.85] | 0.032 [0.65] | 0.015 [0.28] | -0.096* [1.89] |
| Conglomerate affiliated | -0.010 [1.27] | -0.010 [1.49] | 0.025*** [3.82] | -0.006 [1.16] | 0.059 [1.30] | -0.003 [0.07] | -0.043 [1.05] | -0.040 [1.31] |
| Hyper-regulated period | 0.001 [1.11] | 0.001 [0.98] | 0.000 [0.26] | 0.001 [0.89] | 0.026*** [2.81] | 0.032*** [4.25] | 0.024*** [2.95] | 0.027*** [3.10] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.21 | 0.22 | 0.25 | 0.22 | 0.24 | 0.41 | 0.31 | 0.28 |
| Adj R-square | 0.19 | 0.20 | 0.23 | 0.20 | 0.22 | 0.40 | 0.29 | 0.26 |
| F-statistics | 5.17 | 7.00 | 8.20 | 8.19 | 9.49 | 19.98 | 11.99 | 37.18 |

Table 9 presents the ordinary least squares (OLS) regressions of loan loss provisions/assets (the left four columns) and nonperforming loans/assets (the right four columns) on Focus Indices, ownership variables, conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), the interaction terms between Focus Indices and ownership variables, between Focus Indices and conglomerate affiliation dummy, and control variables including equity ratio, size variables (including both ln(assets) and squared term of ln(assets)), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The Focus Index in the first column represents the loan Focus Index, and the same Focus Index is used to construct the interaction terms between Focus Indices and other variables. The Focus Indices in the second, third, and fourth columns represent deposit Focus Index, asset Focus Index, geographic Focus Index. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

Table 10 Summary statistics of variables used in efficiency estimations

| | Obs. | Mean | Median | Std. Dev. | Minimum | Maximum |
|--|------|--------|--------|-----------|---------|---------|
| <i>Profit (Cost) (in billion US\$)</i> | | | | | | |
| Total profits | 464 | 0.189 | 0.015 | 0.729 | -0.080 | 5.784 |
| Total costs | 464 | 0.976 | 0.092 | 2.679 | 0.000 | 21.200 |
| <i>Output Quantities (in billion US\$)</i> | | | | | | |
| Total loans (y_1) | 464 | 23.800 | 1.617 | 67.600 | 0.000 | 426.000 |
| Total deposits (y_2) | 464 | 39.300 | 2.562 | 114.000 | 0.000 | 791.000 |
| Liquid assets (y_3) | 464 | 5.323 | 0.347 | 16.100 | 0.012 | 112.000 |
| Other earning assets (y_4) | 464 | 16.900 | 1.356 | 50.700 | 0.005 | 444.000 |
| <i>Input Prices</i> | | | | | | |
| Price of funds (w_1) | 464 | 0.027 | 0.020 | 0.016 | 0.003 | 0.067 |
| Price of fixed capital (w_2) | 464 | 0.943 | 0.760 | 0.592 | 0.174 | 2.500 |
| Price of labor (w_3) | 464 | 14.418 | 14.528 | 2.876 | 0.720 | 21.105 |
| Total assets (in billion US\$) | 464 | 44.000 | 3.332 | 125.000 | 0.033 | 880.000 |

Table 10 presents the summary statistics of basic variables used in the profit and cost efficiency estimations. In the translog based estimations of profit (cost) efficiency, output variables considered are total loans, total deposits, liquid assets, and other earning assets, and the input variables are: w_1 (price of funds, proxied by the ratio of interest expenses to total deposits), w_2 (price of fixed capital, proxied by the ratio of other operating expenses to fixed assets), w_3 (price of labor, proxied by the ratio of personnel expenses to total number of employees). The outputs are normalized by total assets. All financial values are inflation-adjusted to the base year 1996.

Table 11 OLS regressions of profit efficiency on Focus Indices and ownership

| | Dependent Variable: Profit Efficiency | | | | | | | |
|--|---------------------------------------|--------------------------------|--------------------------------|---------------------------------|---------------------------------|---------------------------------|---------------------------------|--------------------------------|
| | Loan Diversification | | Deposit Diversification | | Asset Diversification | | Geographical Diversification | |
| Constant | 1.441 ^{***} [4.54] | 1.476 ^{***} [4.79] | 1.515 ^{***} [3.82] | 1.510 ^{***} [3.79] | 1.551 ^{***} [4.60] | 1.612 ^{***} [4.99] | 1.334 ^{***} [3.23] | 1.372 ^{***} [3.41] |
| Big Four | -0.082 [*] [1.84] | -0.067 [*] [1.67] | -0.002 ^{**} [2.02] | -0.019 ^{**} [2.16] | -0.119 ^{**} [2.39] | -0.128 ^{**} [2.57] | -0.132 ^{**} [2.44] | -0.062 ^{**} [2.21] |
| State ownership | -0.067 [0.45] | -0.057 [0.36] | -0.019 [0.13] | -0.006 [0.04] | -0.217 ^{***} [2.78] | -0.199 ^{**} [2.55] | -0.017 [0.96] | -0.017 [0.96] |
| Foreign ownership | 0.071 [*] [1.86] | 0.076 [*] [1.89] | 0.029 [*] [1.85] | 0.013 ^{**} [2.35] | 0.083 ^{**} [2.45] | 0.047 [*] [1.78] | 0.035 ^{**} [2.41] | 0.039 ^{**} [2.50] |
| Focus Index | 0.068 ^{**} [2.33] | 0.054 ^{**} [2.25] | 0.047 ^{**} [2.26] | 0.076 ^{**} [2.42] | 0.091 ^{**} [2.03] | 0.047 ^{**} [2.48] | 0.046 ^{**} [2.36] | 0.044 ^{**} [2.27] |
| Focus Index × Big Four | 0.193 [1.10] | 0.173 [0.98] | 0.023 [0.08] | 0.002 [0.01] | 0.306 [*] [1.82] | 0.331 ^{**} [2.09] | 0.660 [0.50] | 0.365 [0.28] |
| Focus Index × State ownership | -0.144 [0.43] | -0.120 [0.34] | -0.020 [0.06] | -0.031 [0.09] | -0.491 ^{***} [3.15] | -0.444 ^{***} [2.84] | -0.017 [0.48] | -0.018 [0.45] |
| Focus Index × Foreign ownership | -0.105 ^{**} [2.55] | -0.106 ^{**} [2.54] | -0.001 ^{**} [2.01] | -0.086 ^{**} [2.12] | -0.128 ^{**} [2.20] | -0.040 ^{**} [2.33] | -0.005 ^{**} [2.06] | -0.007 ^{**} [2.08] |
| Focus Index × Conglomerate affiliated | -0.008 ^{**} [2.11] | -0.006 ^{**} [2.07] | -0.080 ^{**} [2.51] | -0.088 ^{**} [2.56] | -0.093 ^{**} [2.32] | -0.089 ^{**} [2.51] | -0.071 ^{**} [2.33] | -0.066 ^{**} [2.18] |
| Loan loss provisions/assets | -0.104 [0.27] | | -0.141 [0.39] | | -0.309 [0.73] | | -0.057 [0.15] | |
| Nonperforming loans/assets | | -0.066 ^{**} [2.25] | | -0.099 ^{***} [3.19] | | -0.090 ^{***} [3.04] | | -0.050 [*] [1.80] |
| ln(assets) | -0.110 [*] [1.73] | -0.108 [*] [1.90] | -0.125 [1.26] | -0.117 [1.21] | -0.122 [1.46] | -0.105 [1.45] | -0.083 [1.05] | -0.085 [1.21] |
| Squared ln(assets) | -0.078 [1.64] | -0.081 [*] [1.72] | -0.081 [*] [1.88] | -0.077 [*] [1.78] | -0.094 ^{**} [2.05] | -0.099 ^{**} [2.21] | -0.066 [1.21] | -0.069 [1.31] |
| Equity/assets | 0.002 [1.53] | 0.002 [1.59] | 0.002 [*] [1.77] | 0.002 [1.64] | 0.003 [*] [1.96] | 0.003 ^{**} [2.10] | 0.002 [1.10] | 0.002 [1.19] |
| Conglomerate affiliated | 0.008 [0.22] | 0.010 [0.31] | 0.031 [0.44] | 0.033 [0.45] | 0.031 [1.05] | 0.027 [1.09] | 0.066 ^{**} [2.29] | 0.063 ^{**} [2.24] |
| Hyper-regulated period | 0.001 [0.08] | 0.002 [0.39] | -0.001 [0.19] | 0.002 [0.37] | -0.001 [0.14] | 0.001 [0.20] | 0.001 [0.03] | 0.002 [0.26] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.08 | 0.09 | 0.08 | 0.10 | 0.11 | 0.13 | 0.09 | 0.10 |
| Adj R-square | 0.05 | 0.06 | 0.05 | 0.07 | 0.09 | 0.10 | 0.06 | 0.07 |
| F-statistics | 3.46 | 3.75 | 3.32 | 3.80 | 5.26 | 5.58 | 5.39 | 5.66 |

Table 11 presents the ordinary least squares (OLS) regressions of profit efficiency on Focus Indices, ownership variables, conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), the interaction terms between Focus Indices and ownership variables, between Focus Indices and conglomerate affiliation dummy, and control variables including size (including both ln(assets) and squared term of ln(assets)), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The Focus Index in the first paired columns represents the loan Focus Index, and the same Focus Index is also used to construct the interaction terms between Focus Indices and other variables. The Focus Indices in the second, third, and fourth paired columns represent deposit Focus Index, asset Focus Index, geographic Focus Index. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

Table 12 OLS regressions of cost efficiency on Focus Indices and ownership

| | Dependent Variable: Cost Efficiency | | | | | | | |
|--|-------------------------------------|--------------------|----------------------------|--------------------|--------------------------|--------------------|---------------------------------|---------------------|
| | Loan Diversification | | Deposit Diversification | | Asset Diversification | | Geographical Diversification | |
| Constant | -0.766 [1.21] | -0.655 [0.99] | -0.692 [1.12] | -0.680 [1.10] | -0.598 [1.02] | -0.416 [0.68] | -0.521 [0.84] | -0.360 [0.55] |
| Big Four | -0.026** [2.22] | -0.056** [2.49] | -0.083*** [2.60] | -0.077** [2.56] | -0.130** [2.06] | -0.097* [1.80] | 0.683** [2.02] | 1.005*** [2.93] |
| State ownership | -0.081** [2.43] | -0.046** [2.25] | -0.022** [2.12] | -0.030** [2.16] | -0.263* [1.75] | -0.280* [1.93] | -0.050 [1.56] | -0.041 [1.23] |
| Foreign ownership | -0.040** [2.21] | -0.047** [2.25] | -0.004** [2.04] | -0.051** [2.40] | -0.091* [1.67] | -0.146** [2.04] | 0.168 [1.32] | 0.159 [1.36] |
| Focus Index | 0.263** [2.10] | 0.212* [1.90] | 0.041** [2.20] | 0.057** [2.27] | 0.287 [1.53] | 0.383** [2.10] | 0.086* [1.67] | 0.089* [1.67] |
| Focus Index × Big Four | -0.031 [0.13] | -0.056 [0.23] | 0.245 [0.86] | 0.283 [1.00] | -0.277 [1.03] | -0.161 [0.62] | -2.804* [1.87] | -4.169*** [2.70] |
| Focus Index × State ownership | -0.222 [0.49] | -0.140 [0.32] | 0.011 [0.03] | 0.026 [0.07] | 0.621* [1.70] | 0.668* [1.88] | 0.060 [1.07] | 0.048 [0.82] |
| Focus Index × Foreign ownership | -0.204** [2.46] | -0.244** [2.55] | -0.057** [2.30] | -0.172* [1.78] | -0.325** [2.10] | -0.472 [1.53] | -0.120* [1.87] | -0.101* [1.79] |
| Focus Index × Conglomerate affiliated | -0.084** [2.54] | -0.058** [2.37] | -0.108 [1.64] | -0.112* [1.66] | -0.148* [1.84] | -0.206 [1.23] | -0.049** [2.11] | -0.038* [1.84] |
| Loan loss provisions/assets | -0.680 [0.81] | | -0.498 [0.60] | | -0.506 [0.59] | | -0.550 [0.65] | |
| Nonperforming loans/assets | | -0.109 [1.20] | | -0.143 [1.17] | | -0.169* [1.66] | | -0.147 [1.46] |
| ln(assets) | 0.178* [1.96] | 0.145 [1.56] | 0.231* [1.86] | 0.219* [1.74] | 0.143 [1.29] | 0.120 [1.09] | 0.135 [1.38] | 0.096 [0.95] |
| Squared ln(assets) | 0.145* [1.75] | 0.136 [1.60] | 0.154* [1.93] | 0.156** [1.97] | 0.152** [1.99] | 0.136* [1.72] | 0.113 [1.37] | 0.094 [1.10] |
| Equity/assets | -0.004* [1.66] | -0.004 [1.57] | -0.005* [1.87] | -0.005* [1.96] | -0.005* [1.91] | -0.004* [1.69] | -0.003 [1.25] | -0.003 [1.03] |
| Conglomerate affiliated | 0.039 [0.57] | 0.026 [0.37] | 0.054 [0.69] | 0.059 [0.75] | 0.060 [0.85] | 0.080 [1.19] | 0.066* [1.88] | 0.063* [1.78] |
| Hyper-regulated period | 0.001 [0.09] | 0.003 [0.21] | -0.006 [0.43] | -0.002 [0.12] | -0.001 [0.09] | 0.003 [0.17] | -0.005 [0.39] | -0.002 [0.14] |
| Observations | 463 | 463 | 463 | 463 | 463 | 463 | 463 | 463 |
| R-square | 0.05 | 0.05 | 0.04 | 0.04 | 0.04 | 0.05 | 0.04 | 0.05 |
| Adj R-square | 0.02 | 0.02 | 0.01 | 0.01 | 0.01 | 0.02 | 0.01 | 0.02 |
| F-statistics | 2.39 | 2.19 | 1.66 | 1.74 | 2.13 | 2.15 | 3.32 | 3.51 |

Table 12 presents the ordinary least squares (OLS) regressions of cost efficiency on Focus Indices, ownership variables, conglomerate affiliation dummy (equal to 1 if the bank is affiliated with a conglomerate, 0 otherwise), the interaction terms between Focus Indices and ownership variables, between Focus Indices and conglomerate affiliation dummy, and control variables including size (including both ln(assets) and squared term of ln(assets)), and hyper-regulated period dummy (equal to 1 for period 1996-2001, 0 otherwise). Majority Domestic private ownership and the less-regulated period are considered omitted variables in the regressions. The Focus Index in the first paired columns represents the loan Focus Index, and the same Focus Index is also used to construct the interaction terms between Focus Indices and other variables. The Focus Indices in the second, third, and fourth paired columns represent deposit Focus Index, asset Focus Index, geographic Focus Index. Absolute values of t statistics (based on White heteroskedastic-consistent standard errors) are presented in brackets. *, **, and *** represent significance level of 10%, 5%, and 1% respectively.

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