**Some Determinants of Successful Migrant Reintegration**

**Contents**

[Reintegration Economic Survey (RES) 2](#_Toc139279525)

[Model 1: Determinants of Business Success 2](#_Toc139279526)

[Model 2: Determinants of Business Profitability 8](#_Toc139279527)

[Model 3: Effect of Training on Business Success 13](#_Toc139279528)

[Model 4: Determinants of Future Intentions to Migrate 19](#_Toc139279529)

[Reintegration Sustainability Survey (RSS) 24](#_Toc139279530)

[Model 5: Determinants of Sustainable Reintegration (Composite Score) 24](#_Toc139279531)

[Model 6: Determinants of Sustainable Reintegration (Economic Score) 29](#_Toc139279532)

[Supplementary Analysis (RES) 34](#_Toc139279533)

[Model 7: Determinants of Employee Number 34](#_Toc139279534)

[Appendix I: Interaction of Country and Business Type for Model 1 38](#_Toc139279535)

[Appendix II: Correlations Between RSS Scores 44](#_Toc139279536)

# Reintegration Economic Survey (RES)

## Model 1: Determinants of Business Success

Logistic regression was used to identify the determinants of business success. The dependent variable was Business Success (“Comment se porte votre entreprise ou business actuellement ?”). Business Success initially had 5 possible outcomes (Figure 1), but was recoded to 2 outcomes (High or Low Business Success, Figure 2) to obtain a balanced sample with a sufficient number of observations in each category.

Figure 1

Proportion of outcomes of Business Success (N = 1,952)

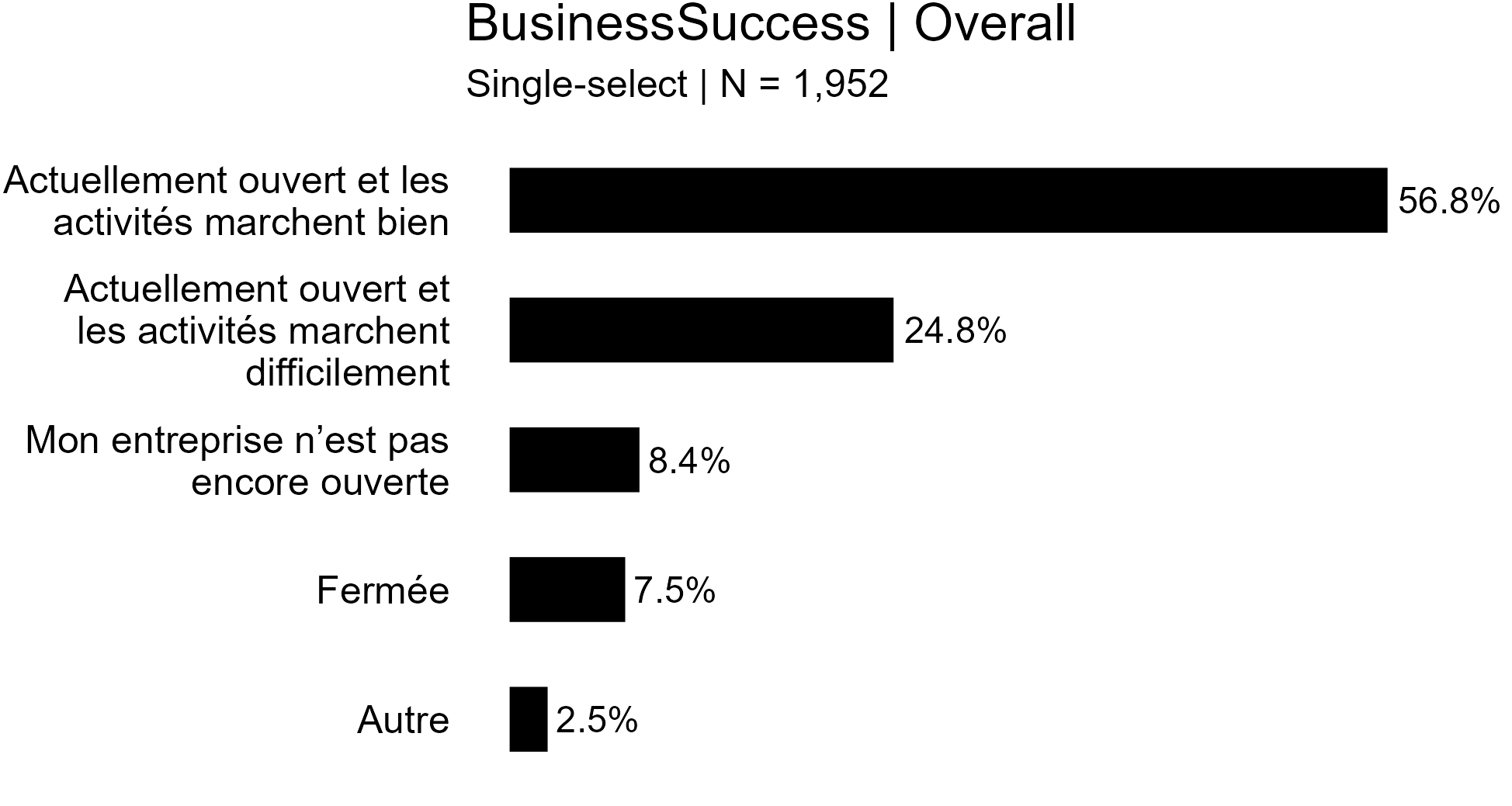


Figure 2

Proportion of outcomes of Business Success (recoded, N = 1,917)

A picture containing black, darkness

Description automatically generated

Fourteen variables were used as predictors of Business Success. These predictors are listed in the Set of Tables 1. One variable, Business Has Employees, was not used due to collinearity with Employee Number (VIF = 3.600; Tolerance = 0.278).

As for the dependent variable, most independent variables were recoded to a smaller number of categories to achieve a sufficient number of observations in each category (see Appendix I on how these were recoded).

Results showed that the best predictors of Business Success are the country of interview, the number of employees in the business, the business type, whether the assistance type received was the first choice of the respondent, and whether the respondent received business advice from IOM (all *p* < .001). The full results are in Set of Tables 1.

For example, respondents in Ghana are more likely to report a High Business Success than respondents in any other country, after controlling for the effect of all other variables. Furthermore, respondents who had employees are at least 2.4 times more likely to report a High Business Success than those who do not have employees, and respondents who have a business in transport are more than 4 times more likely to report a High Business Success than those in agriculture or aviculture.

Other significant predictors of Business Success were age, gender, and business members (*p* < 0.05), with the country of return being borderline significant (*p* = 0.07). In contrast, the kind of support received (cash vs. materials), disability, and how long the respondent was a migrant, do not seem to determine Business Success.

This model has an accuracy of 69% (pseudo R-squared = 0.151), meaning that it correctly predicts whether respondents will have a High or Low Business Success in 69% of all cases (an improvement of 11 percentage points over the baseline).

The fact that transport is apparently the most successful business type is surprising, especially since transport assistance was proposed mainly in a single country, Guinea. Although the above model controls for country and shows that overall, transport is a highly successful activity, it does not control for whether transport is successful *depending* on which country in which it is proposed.

To find out, we ran the same model with an interaction term, which was Country \* Business Type. Results are presented in Appendix I, and show that the interaction is borderline significant (*p* = 0.052). Except in Senegal, transport businesses are more likely to yield a High Business Success than a Low Business Success, in at least 70% of cases. In other words, we cannot say that transport is successful only in Guinea, or that the success of transport businesses is explained (only) by the country in which it is implemented.

All that being said, does this mean that transport is the most successful type of activity? Not necessarily. To find out, a larger sample size would be needed for all cities, which is one limitation of the current data set.

Set of Tables 1

Binomial Logistic Regression for Business Success

| Model Fit Measures | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | **Overall Model Test** | | | | | |
| **Model** | | **R²McF** | | **χ²** | | **df** | | **p** | |
| 1 |  | 0.146 |  | 381 |  | 26 |  | < .001 |  |
|  | | | | | | | | | |

| Omnibus Likelihood Ratio Tests | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
| **Predictor** | | **χ²** | | **df** | | **p** | |
| Country |  | 110.1203 |  | 5 |  | < .001 |  |
| EmployeeNumber |  | 44.0700 |  | 2 |  | < .001 |  |
| BusinessType |  | 41.2070 |  | 4 |  | < .001 |  |
| FirstChoice |  | 30.2756 |  | 1 |  | < .001 |  |
| ReceivedIOMBusinessAdvice |  | 13.1366 |  | 1 |  | < .001 |  |
| AgeGroup |  | 9.7909 |  | 1 |  | 0.002 |  |
| BusinessMembers |  | 8.3377 |  | 1 |  | 0.004 |  |
| Gender |  | 7.0912 |  | 1 |  | 0.008 |  |
| CountryOfReturn |  | 8.4372 |  | 4 |  | 0.077 |  |
| Disabled |  | 2.2887 |  | 1 |  | 0.130 |  |
| ReceivedSupportAs |  | 2.6113 |  | 2 |  | 0.271 |  |
| InterviewType |  | 0.6815 |  | 1 |  | 0.409 |  |
| MigrationDuration |  | 0.2600 |  | 1 |  | 0.610 |  |
| CoronaImpactOnBusiness |  | 0.0447 |  | 1 |  | 0.832 |  |
|  | | | | | | | |

| Model Coefficients - BusinessSuccess | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **Z** | | **p** | | **Odds ratio** | |
| Intercept |  | -3.2050 |  | 0.3866 |  | -8.291 |  | < .001 |  | 0.0406 |  |
| Country: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Côte D'Ivoire |  | -0.2318 |  | 0.2226 |  | -1.041 |  | 0.298 |  | 0.7931 |  |
| Burkina Faso – Côte D'Ivoire |  | 0.1684 |  | 0.2555 |  | 0.659 |  | 0.510 |  | 1.1834 |  |
| Ghana – Côte D'Ivoire |  | 2.3385 |  | 0.3183 |  | 7.347 |  | < .001 |  | 10.3655 |  |
| Guinée – Côte D'Ivoire |  | 0.7207 |  | 0.2183 |  | 3.301 |  | < .001 |  | 2.0559 |  |
| Sénégal – Côte D'Ivoire |  | 0.1726 |  | 0.2097 |  | 0.823 |  | 0.411 |  | 1.1884 |  |
| EmployeeNumber: |  |  |  |  |  |  |  |  |  |  |  |
| 1 – 0 |  | 1.0152 |  | 0.1837 |  | 5.527 |  | < .001 |  | 2.7598 |  |
| 1+ – 0 |  | 0.8882 |  | 0.2073 |  | 4.284 |  | < .001 |  | 2.4308 |  |
| BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Agriculture/aviculture |  | 0.4893 |  | 0.2090 |  | 2.341 |  | 0.019 |  | 1.6311 |  |
| Commerce – Agriculture/aviculture |  | 0.9207 |  | 0.1874 |  | 4.912 |  | < .001 |  | 2.5110 |  |
| Elevage – Agriculture/aviculture |  | 0.6233 |  | 0.2182 |  | 2.857 |  | 0.004 |  | 1.8650 |  |
| Transport – Agriculture/aviculture |  | 1.4307 |  | 0.2592 |  | 5.519 |  | < .001 |  | 4.1815 |  |
| FirstChoice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.8219 |  | 0.1515 |  | 5.425 |  | < .001 |  | 2.2748 |  |
| ReceivedIOMBusinessAdvice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.4314 |  | 0.1195 |  | 3.611 |  | < .001 |  | 1.5393 |  |
| AgeGroup: |  |  |  |  |  |  |  |  |  |  |  |
| 14-35 – 36+ |  | 0.4418 |  | 0.1419 |  | 3.115 |  | 0.002 |  | 1.5556 |  |
| BusinessMembers: |  |  |  |  |  |  |  |  |  |  |  |
| Moi uniquement – Moi et d'autres |  | 0.4521 |  | 0.1572 |  | 2.877 |  | 0.004 |  | 1.5716 |  |
| Gender: |  |  |  |  |  |  |  |  |  |  |  |
| Masculin – Féminin |  | 0.4903 |  | 0.1851 |  | 2.649 |  | 0.008 |  | 1.6328 |  |
| CountryOfReturn: |  |  |  |  |  |  |  |  |  |  |  |
| Algerie – Autre |  | 0.2154 |  | 0.2068 |  | 1.041 |  | 0.298 |  | 1.2404 |  |
| Lybie – Autre |  | 0.5149 |  | 0.2028 |  | 2.539 |  | 0.011 |  | 1.6734 |  |
| Maroc – Autre |  | 0.3685 |  | 0.2057 |  | 1.791 |  | 0.073 |  | 1.4456 |  |
| Niger – Autre |  | 0.3860 |  | 0.2129 |  | 1.813 |  | 0.070 |  | 1.4711 |  |
| Disabled: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | -0.3616 |  | 0.2401 |  | -1.506 |  | 0.132 |  | 0.6966 |  |
| ReceivedSupportAs: |  |  |  |  |  |  |  |  |  |  |  |
| En nature – En espèces |  | -0.2489 |  | 0.1806 |  | -1.378 |  | 0.168 |  | 0.7797 |  |
| Mixte – En espèces |  | -0.2799 |  | 0.1996 |  | -1.402 |  | 0.161 |  | 0.7558 |  |
| InterviewType: |  |  |  |  |  |  |  |  |  |  |  |
| Terrain/bureau OIM – Par téléphone |  | 0.1103 |  | 0.1337 |  | 0.825 |  | 0.409 |  | 1.1166 |  |
| MigrationDuration |  | -0.0124 |  | 0.0243 |  | -0.510 |  | 0.610 |  | 0.9877 |  |
| CoronaImpactOnBusiness: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.0298 |  | 0.1407 |  | 0.212 |  | 0.832 |  | 1.0302 |  |
| Note. Estimates represent the log odds of "BusinessSuccess = High" vs. "BusinessSuccess = Low" | | | | | | | | | | | |
|  | | | | | | | | | | | |

| Collinearity Statistics | | | | | |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |
|  | | **VIF** | | **Tolerance** | |
| Country |  | 1.30 |  | 0.770 |  |
| EmployeeNumber |  | 1.08 |  | 0.922 |  |
| BusinessType |  | 1.13 |  | 0.888 |  |
| FirstChoice |  | 1.05 |  | 0.949 |  |
| ReceivedIOMBusinessAdvice |  | 1.17 |  | 0.854 |  |
| AgeGroup |  | 1.05 |  | 0.952 |  |
| BusinessMembers |  | 1.15 |  | 0.866 |  |
| Gender |  | 1.09 |  | 0.920 |  |
| CountryOfReturn |  | 1.08 |  | 0.924 |  |
| Disabled |  | 1.03 |  | 0.972 |  |
| ReceivedSupportAs |  | 1.32 |  | 0.757 |  |
| InterviewType |  | 1.24 |  | 0.808 |  |
| MigrationDuration |  | 1.04 |  | 0.960 |  |
| CoronaImpactOnBusiness |  | 1.19 |  | 0.837 |  |
|  | | | | | |

| Predictive Measures | |
| --- | --- |
|  |  |
| **Accuracy** | |
| 0.687 |  |
| Note. The cut-off value is set to 0.5 | |
|  | |

## Model 2: Determinants of Business Profitability

Logistic regression was used to identify the determinants of business profitability. The dependent variable was Business Profitability (“L’entreprise vous permet -elle de gagner assez d’argent pour subvenir à vos besoins et à celle de votre famille ?”). Business Profitability initially had 4 possible outcomes (Figure 3), but was recoded to 2 outcomes (High or Low Business Profitability, Figure 4) to obtain a balanced sample with a sufficient number of observations in each category.

Figure 3

Proportion of outcomes of Business Profitability (N = 1,952)

A picture containing black, darkness

Description automatically generated

Figure 4

Proportion of outcomes of Business Profitability (recoded, N = 1,917)

A picture containing black, darkness

Description automatically generated

Fourteen variables were used as predictors of Business Profitability. These predictors are listed in the Set of Tables 2. One variable, Business Has Employees, was not used due to collinearity with Employee Number (VIF = 3.940; Tolerance = 0.254).

As for the dependent variable, most independent variables were recoded to a smaller number of categories to achieve a sufficient number of observations in each category (see Appendix I on how these were recoded).

Results showed that the best predictors of Business Profitability are the country of interview, the business type, the number of employees in the business, whether the respondent received business advice from IOM, whether the business is run by the respondent or by the respondent and associates, and whether the assistance type received was the first choice of the respondent (all *p* < .001). The full results are in Set of Tables 2.

These results are in line with those of Model 1, with respondents in Ghana, who run a business in transport, who received business advice from the IOM, who run their business on their own, and who received support of their first choice, more likely to report a High Business Profitability than their counterparts.

That said, there were also interesting differences. For example, men and younger respondents were *not* more likely to report a High Business Profitability compared to women and older respondents, contrary to what was found in Model 1.[[1]](#footnote-1)

This model has an accuracy of 70% (pseudo R-squared = 0.174), meaning that it correctly predicts whether respondents will have a High or Low Business Profitability in 70% of all cases (an improvement of 12 percentage points over the baseline).

Set of Tables 2

Binomial Logistic Regression for Business Profitability

| Model Fit Measures | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | **Overall Model Test** | | | | | |
| **Model** | | **R²McF** | | **χ²** | | **df** | | **p** | |
| 1 |  | 0.174 |  | 454 |  | 26 |  | < .001 |  |
|  | | | | | | | | | |

| Omnibus Likelihood Ratio Tests | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
| **Predictor** | | **χ²** | | **df** | | **p** | |
| Country |  | 116.768 |  | 5 |  | < .001 |  |
| BusinessType |  | 62.118 |  | 4 |  | < .001 |  |
| EmployeeNumber |  | 33.653 |  | 2 |  | < .001 |  |
| ReceivedIOMBusinessAdvice |  | 20.817 |  | 1 |  | < .001 |  |
| BusinessMembers |  | 17.348 |  | 1 |  | < .001 |  |
| FirstChoice |  | 13.107 |  | 1 |  | < .001 |  |
| CountryOfReturn |  | 8.639 |  | 4 |  | 0.071 |  |
| Disabled |  | 3.760 |  | 1 |  | 0.053 |  |
| Gender |  | 2.533 |  | 1 |  | 0.111 |  |
| CoronaImpactOnBusiness |  | 1.567 |  | 1 |  | 0.211 |  |
| AgeGroup |  | 1.432 |  | 1 |  | 0.231 |  |
| InterviewType |  | 1.291 |  | 1 |  | 0.256 |  |
| MigrationDuration |  | 1.086 |  | 1 |  | 0.297 |  |
| ReceivedSupportAs |  | 0.765 |  | 2 |  | 0.682 |  |
|  | | | | | | | |

| Model Coefficients - BusinessProfitability | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **Z** | | **p** | | **Odds ratio** | |
| Intercept |  | -2.8723 |  | 0.3975 |  | -7.225 |  | < .001 |  | 0.0566 |  |
| Country: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Côte D'Ivoire |  | -0.8114 |  | 0.2342 |  | -3.464 |  | < .001 |  | 0.4442 |  |
| Burkina Faso – Côte D'Ivoire |  | -0.6062 |  | 0.2869 |  | -2.112 |  | 0.035 |  | 0.5454 |  |
| Ghana – Côte D'Ivoire |  | 1.4433 |  | 0.2725 |  | 5.298 |  | < .001 |  | 4.2347 |  |
| Guinée – Côte D'Ivoire |  | 0.7150 |  | 0.2147 |  | 3.331 |  | < .001 |  | 2.0442 |  |
| Sénégal – Côte D'Ivoire |  | 0.3143 |  | 0.2146 |  | 1.465 |  | 0.143 |  | 1.3693 |  |
| BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Agriculture/aviculture |  | 0.1991 |  | 0.2108 |  | 0.944 |  | 0.345 |  | 1.2203 |  |
| Commerce – Agriculture/aviculture |  | 0.5811 |  | 0.1893 |  | 3.070 |  | 0.002 |  | 1.7881 |  |
| Elevage – Agriculture/aviculture |  | -0.5390 |  | 0.2351 |  | -2.293 |  | 0.022 |  | 0.5833 |  |
| Transport – Agriculture/aviculture |  | 1.1347 |  | 0.2467 |  | 4.599 |  | < .001 |  | 3.1102 |  |
| EmployeeNumber: |  |  |  |  |  |  |  |  |  |  |  |
| 1 – 0 |  | 0.5942 |  | 0.1670 |  | 3.557 |  | < .001 |  | 1.8116 |  |
| 1+ – 0 |  | 1.0079 |  | 0.1979 |  | 5.092 |  | < .001 |  | 2.7397 |  |
| ReceivedIOMBusinessAdvice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.5726 |  | 0.1263 |  | 4.535 |  | < .001 |  | 1.7729 |  |
| BusinessMembers: |  |  |  |  |  |  |  |  |  |  |  |
| Moi uniquement – Moi et d'autres |  | 0.6414 |  | 0.1560 |  | 4.111 |  | < .001 |  | 1.8991 |  |
| FirstChoice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.6170 |  | 0.1740 |  | 3.545 |  | < .001 |  | 1.8533 |  |
| CountryOfReturn: |  |  |  |  |  |  |  |  |  |  |  |
| Algerie – Autre |  | 0.4462 |  | 0.2170 |  | 2.056 |  | 0.040 |  | 1.5623 |  |
| Lybie – Autre |  | 0.1542 |  | 0.2127 |  | 0.725 |  | 0.468 |  | 1.1668 |  |
| Maroc – Autre |  | -0.0302 |  | 0.2140 |  | -0.141 |  | 0.888 |  | 0.9703 |  |
| Niger – Autre |  | 0.3419 |  | 0.2212 |  | 1.546 |  | 0.122 |  | 1.4076 |  |
| Disabled: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | -0.5176 |  | 0.2736 |  | -1.892 |  | 0.058 |  | 0.5959 |  |
| Gender: |  |  |  |  |  |  |  |  |  |  |  |
| Masculin – Féminin |  | 0.3056 |  | 0.1936 |  | 1.578 |  | 0.115 |  | 1.3574 |  |
| CoronaImpactOnBusiness: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.1712 |  | 0.1366 |  | 1.253 |  | 0.210 |  | 1.1867 |  |
| AgeGroup: |  |  |  |  |  |  |  |  |  |  |  |
| 14-35 – 36+ |  | 0.1719 |  | 0.1440 |  | 1.193 |  | 0.233 |  | 1.1875 |  |
| InterviewType: |  |  |  |  |  |  |  |  |  |  |  |
| Terrain/bureau OIM – Par téléphone |  | -0.1541 |  | 0.1357 |  | -1.136 |  | 0.256 |  | 0.8572 |  |
| MigrationDuration |  | -0.0259 |  | 0.0249 |  | -1.040 |  | 0.298 |  | 0.9744 |  |
| ReceivedSupportAs: |  |  |  |  |  |  |  |  |  |  |  |
| En nature – En espèces |  | -0.0863 |  | 0.1867 |  | -0.462 |  | 0.644 |  | 0.9173 |  |
| Mixte – En espèces |  | -0.1898 |  | 0.2171 |  | -0.874 |  | 0.382 |  | 0.8272 |  |
| Note. Estimates represent the log odds of "BusinessProfitability = High" vs. "BusinessProfitability = Low" | | | | | | | | | | | |
|  | | | | | | | | | | | |

| Collinearity Statistics | | | | | |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |
|  | | **VIF** | | **Tolerance** | |
| Country |  | 1.29 |  | 0.778 |  |
| BusinessType |  | 1.10 |  | 0.908 |  |
| EmployeeNumber |  | 1.08 |  | 0.925 |  |
| ReceivedIOMBusinessAdvice |  | 1.21 |  | 0.830 |  |
| BusinessMembers |  | 1.14 |  | 0.875 |  |
| FirstChoice |  | 1.04 |  | 0.961 |  |
| CountryOfReturn |  | 1.09 |  | 0.916 |  |
| Disabled |  | 1.03 |  | 0.973 |  |
| Gender |  | 1.07 |  | 0.931 |  |
| CoronaImpactOnBusiness |  | 1.18 |  | 0.849 |  |
| AgeGroup |  | 1.06 |  | 0.941 |  |
| InterviewType |  | 1.18 |  | 0.844 |  |
| MigrationDuration |  | 1.05 |  | 0.953 |  |
| ReceivedSupportAs |  | 1.28 |  | 0.780 |  |
|  | | | | | |

**Prediction**

| Predictive Measures | |
| --- | --- |
|  |  |
| **Accuracy** | |
| 0.699 |  |
| Note. The cut-off value is set to 0.5 | |
|  | |

## Model 3: Effect of Training on Business Success

Model 3 is similar to Model 1 with two important differences. First, Model 3 utilizes a different data set, which is based on both Kobo data and Mimosa data. As explained in the document data\_sets\_summary.doc, this dataset possibly contains errors, and all results of Model 3 should be used with caution.

Second, Model 3 utilizes the same independent variables as Model 1 to predict Business Success, except that variables related to training were added.[[2]](#footnote-2) These variables were:

|  |  |  |
| --- | --- | --- |
| Name in this document | Name in Mimosa/Kobo | Definition |
| Training Type | Type de formation (Mimosa) | The type of training received by the respondent |
| Training Duration | Duree formation (Mimosa) | The duration of the training, in days |
| Assistance Duration | Date de reception de la reintegration (Mimosa) and Date de l'enquête (Kobo) | The time lapse between the reception of reintegration support and interview date, in days |
| Return to Reintegration | ArrivalDate\_Mimosa (Mimosa) and Date de reception de la reintegration (Mimosa) | The time lapse between the arrival date and the reception of reintegration support, in days |

The results were similar to those of Model 1, with Country, Business Type, First Choice, and Employee Number being significant predictors of Business Success, see Set of Tables 3.

Regarding the training variables, results showed that Training Type is a significant predictor of Business Success (*p* < .001), whereas Training Type (*p* = 0.055) and Assistance Duration (*p* = 0.078) are borderline predictors, and Return to Reintegration is not a significant predictor.

In particular, respondents who received training in business or management are nearly 2 times more likely to report a High Business Success than those who did not receive any training. That said, respondents who received any other training (i.e., except business or management) are *not* more likely to report a High Business Success than those who received no training at all, and are *less* likely to report a High Business Success than those who received business or management training.

Concerning Training Duration and Assistance duration, results are harder to interpret. Indeed, results suggest that the longer the training or assistance, the less likely the respondents are to report a High Business Success. This is counterintuitive, but might be explained by the fact that except training in business or management, other training does not mean more business success, as we have just seen above. Since respondents who did not received training at all were all coded as 0 days of training, and did slightly better than those who did receive other training, we might indeed expect a possibly negative relationship between Training Duration and Business Success when all respondents are analysed together.

To test this possibility, an alternative model was fitted with only the respondents who received training (N=561). Assistance Duration was no longer significant, and Training Duration was significant at the *p* < 0.01 level, with again a negative relationship between Training Duration and Business Success. Yet another model, in which only respondents who received Business or management training were included (N=346), found similar results (Training Duration significant at *p* < 0.01, and a negative relationship).

Together, these results suggest that at best, Training Duration has no positive impact on Business Success, and at worst, that longer training programmes have a negative impact on Business Success, when controlling for all other factors. Alternatively, Training Duration might be biased in another way, as we mentioned above.

Set of Tables 3

Binomial Logistic Regression for Business Profitability (Training variables)

| Model Fit Measures | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | **Overall Model Test** | | | | | |
| **Model** | | **R²McF** | | **χ²** | | **df** | | **p** | |
| 1 |  | 0.150 |  | 378 |  | 30 |  | < .001 |  |
|  | | | | | | | | | |

| Omnibus Likelihood Ratio Tests | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
| **Predictor** | | **χ²** | | **df** | | **p** | |
| Country |  | 120.1641 |  | 5 |  | < .001 |  |
| BusinessType |  | 40.4284 |  | 4 |  | < .001 |  |
| FirstChoice |  | 23.7715 |  | 1 |  | < .001 |  |
| EmployeeNumber |  | 32.8440 |  | 2 |  | < .001 |  |
| TrainingType |  | 20.7435 |  | 2 |  | < .001 |  |
| AgeGroup |  | 8.1632 |  | 1 |  | 0.004 |  |
| ReceivedIOMBusinessAdvice |  | 7.3471 |  | 1 |  | 0.007 |  |
| BusinessMembers |  | 5.8210 |  | 1 |  | 0.016 |  |
| CountryOfReturn |  | 9.2952 |  | 4 |  | 0.054 |  |
| TrainingDuration |  | 3.6800 |  | 1 |  | 0.055 |  |
| AssistanceDuration |  | 3.1124 |  | 1 |  | 0.078 |  |
| InterviewType |  | 2.4675 |  | 1 |  | 0.116 |  |
| Gender |  | 1.7421 |  | 1 |  | 0.187 |  |
| ReceivedSupportAs |  | 1.6621 |  | 2 |  | 0.436 |  |
| CoronaImpactOnBusiness |  | 0.4167 |  | 1 |  | 0.519 |  |
| MigrationDuration |  | 0.2375 |  | 1 |  | 0.626 |  |
| ReturnToReintegration |  | 0.0105 |  | 1 |  | 0.919 |  |
|  | | | | | | | |

| Model Coefficients - BusinessSuccess | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **Z** | | **p** | | **Odds ratio** | |
| Intercept |  | -3.4185 |  | 0.4866 |  | -7.025 |  | < .001 |  | 0.0328 |  |
| Country: |  |  |  |  |  |  |  |  |  |  |  |
| Burkina Faso – Autre |  | 0.7223 |  | 0.2739 |  | 2.637 |  | 0.008 |  | 2.0591 |  |
| Côte D'Ivoire – Autre |  | 0.6340 |  | 0.2533 |  | 2.503 |  | 0.012 |  | 1.8852 |  |
| Ghana – Autre |  | 2.8142 |  | 0.3187 |  | 8.829 |  | < .001 |  | 16.6801 |  |
| Guinée – Autre |  | 1.3733 |  | 0.2430 |  | 5.652 |  | < .001 |  | 3.9483 |  |
| Sénégal – Autre |  | 0.6077 |  | 0.2024 |  | 3.003 |  | 0.003 |  | 1.8362 |  |
| BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Agriculture/aviculture |  | 0.3877 |  | 0.2173 |  | 1.784 |  | 0.074 |  | 1.4736 |  |
| Commerce – Agriculture/aviculture |  | 0.9393 |  | 0.1957 |  | 4.800 |  | < .001 |  | 2.5581 |  |
| Elevage – Agriculture/aviculture |  | 0.6889 |  | 0.2246 |  | 3.067 |  | 0.002 |  | 1.9915 |  |
| Transport – Agriculture/aviculture |  | 1.3733 |  | 0.2693 |  | 5.099 |  | < .001 |  | 3.9483 |  |
| FirstChoice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.7470 |  | 0.1548 |  | 4.825 |  | < .001 |  | 2.1108 |  |
| EmployeeNumber: |  |  |  |  |  |  |  |  |  |  |  |
| 1 – 0 |  | 0.8657 |  | 0.1894 |  | 4.570 |  | < .001 |  | 2.3767 |  |
| 1+ – 0 |  | 0.8485 |  | 0.2103 |  | 4.034 |  | < .001 |  | 2.3361 |  |
| TrainingType: |  |  |  |  |  |  |  |  |  |  |  |
| Business/management – None |  | 0.6533 |  | 0.1855 |  | 3.522 |  | < .001 |  | 1.9219 |  |
| Other – None |  | -0.3170 |  | 0.2021 |  | -1.569 |  | 0.117 |  | 0.7284 |  |
| AgeGroup: |  |  |  |  |  |  |  |  |  |  |  |
| 14-35 – 36+ |  | 0.4231 |  | 0.1486 |  | 2.846 |  | 0.004 |  | 1.5267 |  |
| ReceivedIOMBusinessAdvice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.3444 |  | 0.1274 |  | 2.703 |  | 0.007 |  | 1.4112 |  |
| BusinessMembers: |  |  |  |  |  |  |  |  |  |  |  |
| Moi uniquement – Moi et d'autres |  | 0.3900 |  | 0.1620 |  | 2.407 |  | 0.016 |  | 1.4770 |  |
| CountryOfReturn: |  |  |  |  |  |  |  |  |  |  |  |
| Algerie – Autre |  | 0.3114 |  | 0.2189 |  | 1.423 |  | 0.155 |  | 1.3654 |  |
| Lybie – Autre |  | 0.6204 |  | 0.2167 |  | 2.862 |  | 0.004 |  | 1.8596 |  |
| Maroc – Autre |  | 0.3866 |  | 0.2223 |  | 1.739 |  | 0.082 |  | 1.4720 |  |
| Niger – Autre |  | 0.4087 |  | 0.2230 |  | 1.833 |  | 0.067 |  | 1.5049 |  |
| TrainingDuration |  | -0.0421 |  | 0.0209 |  | -2.016 |  | 0.044 |  | 0.9588 |  |
| AssistanceDuration |  | -6.71e−4 |  | 3.83e-4 |  | -1.751 |  | 0.080 |  | 0.9993 |  |
| InterviewType: |  |  |  |  |  |  |  |  |  |  |  |
| Terrain/bureau OIM – Par téléphone |  | 0.2148 |  | 0.1370 |  | 1.568 |  | 0.117 |  | 1.2396 |  |
| Gender: |  |  |  |  |  |  |  |  |  |  |  |
| Masculin – Féminin |  | 0.2977 |  | 0.2257 |  | 1.319 |  | 0.187 |  | 1.3468 |  |
| ReceivedSupportAs: |  |  |  |  |  |  |  |  |  |  |  |
| En nature – En espèces |  | -0.1449 |  | 0.1880 |  | -0.771 |  | 0.441 |  | 0.8651 |  |
| Mixte – En espèces |  | -0.2645 |  | 0.2069 |  | -1.279 |  | 0.201 |  | 0.7676 |  |
| CoronaImpactOnBusiness: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.0961 |  | 0.1490 |  | 0.645 |  | 0.519 |  | 1.1009 |  |
| MigrationDuration |  | -0.0125 |  | 0.0256 |  | -0.487 |  | 0.626 |  | 0.9876 |  |
| ReturnToReintegration |  | -1.60e−5 |  | 1.57e-4 |  | -0.102 |  | 0.919 |  | 1.0000 |  |
| Note. Estimates represent the log odds of "BusinessSuccess = High" vs. "BusinessSuccess = Low" | | | | | | | | | | | |
|  | | | | | | | | | | | |

| Collinearity Statistics | | | | | |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |
|  | | **VIF** | | **Tolerance** | |
| Country |  | 1.34 |  | 0.746 |  |
| BusinessType |  | 1.14 |  | 0.877 |  |
| FirstChoice |  | 1.06 |  | 0.945 |  |
| EmployeeNumber |  | 1.09 |  | 0.918 |  |
| TrainingType |  | 1.27 |  | 0.788 |  |
| AgeGroup |  | 1.05 |  | 0.954 |  |
| ReceivedIOMBusinessAdvice |  | 1.22 |  | 0.819 |  |
| BusinessMembers |  | 1.16 |  | 0.859 |  |
| CountryOfReturn |  | 1.10 |  | 0.909 |  |
| TrainingDuration |  | 1.32 |  | 0.758 |  |
| AssistanceDuration |  | 1.12 |  | 0.889 |  |
| InterviewType |  | 1.24 |  | 0.807 |  |
| Gender |  | 1.07 |  | 0.930 |  |
| ReceivedSupportAs |  | 1.33 |  | 0.750 |  |
| CoronaImpactOnBusiness |  | 1.25 |  | 0.799 |  |
| MigrationDuration |  | 1.04 |  | 0.960 |  |
| ReturnToReintegration |  | 1.21 |  | 0.825 |  |
|  | | | | | |

**Prediction**

| Predictive Measures | |
| --- | --- |
|  |  |
| **Accuracy** | |
| 0.697 |  |
| Note. The cut-off value is set to 0.5 | |
|  | |

## Model 4: Determinants of Future Intentions to Migrate

Logistic regression was used to identify the determinants of future intentions to migrate. The dependent variable was Would Migrate Again (“Avez-vous déjà planifié de migrer de nouveau ?”). Would Migrate Again initially had 4 possible outcomes (Figure 5), but was recoded to 2 outcomes (Yes or No, Figure 5). Despite recoding, this dependent variable is still quite imbalanced, with less than 200 respondents in the least common outcome (Yes), meaning that results should be interpreted with caution.

Figure 5

Proportion of outcomes of Would Migrate Again (N = 2,015)

A picture containing black, darkness

Description automatically generated

Figure 6

Proportion of outcomes of Would Migrate Again (recoded, N = 1,917)

A picture containing black, darkness

Description automatically generated

Fourteen variables were used as predictors of Would Migrate Again. These predictors are listed in the Set of Tables 4. One variable, Business Has Employees, was not used due to collinearity with Employee Number (VIF = 3.070; Tolerance = 0.325).

As for the dependent variable, most independent variables were recoded to a smaller number of categories to achieve a sufficient number of observations in each category (see Appendix I on how these were recoded).

Results showed that the best predictors of Would Migrate Again are the country of interview (*p* < 0.001), where the respondent is returning from (*p* < 0.01), whether the respondents are running their business on their own or with associates (*p* < 0.01), and surprisingly, the interview type (*p* < 0.01). The full results are in Set of Tables 4.

Specifically, after controlling for all other factors, respondents based in Burkina Faso are the least likely to report planning to migrate again, whereas respondents based in Guinea are the most likely to report planning to migrate again (except respondents from all Other countries, though). Furthermore, respondents returning from Libya are the least likely to plan migrating again, whereas respondents returning from Morocco are the most likely to plan migrating again.

Respondents who run their business with other people are 1.7 times more likely to planning to migrate again than respondents who run their business on their own (which makes sense, given that businesses run by the respondent alone also tend to be more successful, as we have seen above), and respondents interviewed in the field or in an IOM office are 1.6 times more likely to report planning to migrate again than those interviewed on the phone.

No other predictor was statistically significant, and it has to be noted that this model explains less variance than all previous models (pseudo R-squared = 0.0677), perhaps because of sample imbalance. In sum, the main finding about future intentions to migrate is that it is determined mainly by where the respondents are based and where they are coming from (Libya is a case in point), as well as other factors that are simply not captured by this model.

Set of Tables 4

Binomial Logistic Regression for Would Migrate Again

| Model Fit Measures | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | **Overall Model Test** | | | | | |
| **Model** | | **R²McF** | | **χ²** | | **df** | | **p** | |
| 1 |  | 0.0677 |  | 85.4 |  | 26 |  | < .001 |  |
|  | | | | | | | | | |

| Omnibus Likelihood Ratio Tests | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
| **Predictor** | | **χ²** | | **df** | | **p** | |
| Country |  | 24.5558 |  | 5 |  | < .001 |  |
| CountryOfReturn |  | 14.7452 |  | 4 |  | 0.005 |  |
| BusinessMembers |  | 7.1933 |  | 1 |  | 0.007 |  |
| InterviewType |  | 7.0308 |  | 1 |  | 0.008 |  |
| FirstChoice |  | 2.1615 |  | 1 |  | 0.142 |  |
| ReceivedSupportAs |  | 2.8659 |  | 2 |  | 0.239 |  |
| ReceivedIOMBusinessAdvice |  | 0.7719 |  | 1 |  | 0.380 |  |
| EmployeeNumber |  | 1.5908 |  | 2 |  | 0.451 |  |
| Gender |  | 0.5096 |  | 1 |  | 0.475 |  |
| Disabled |  | 0.3548 |  | 1 |  | 0.551 |  |
| CoronaImpactOnBusiness |  | 0.2160 |  | 1 |  | 0.642 |  |
| BusinessType |  | 2.1557 |  | 4 |  | 0.707 |  |
| BusinessHasEmployees |  | 0.0946 |  | 1 |  | 0.758 |  |
| MigrationDuration |  | 0.0409 |  | 1 |  | 0.840 |  |
|  | | | | | | | |

| Model Coefficients - WouldMigrateAgain | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **Z** | | **p** | | **Odds ratio** | |
| Intercept |  | -4.10030 |  | 0.8022 |  | -5.111 |  | < .001 |  | 0.0166 |  |
| Country: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Burkina Faso |  | 1.65606 |  | 0.4764 |  | 3.476 |  | < .001 |  | 5.2387 |  |
| Côte D'Ivoire – Burkina Faso |  | 1.33937 |  | 0.5034 |  | 2.661 |  | 0.008 |  | 3.8166 |  |
| Ghana – Burkina Faso |  | 0.10881 |  | 0.6265 |  | 0.174 |  | 0.862 |  | 1.1149 |  |
| Guinée – Burkina Faso |  | 1.63960 |  | 0.4825 |  | 3.398 |  | < .001 |  | 5.1531 |  |
| Sénégal – Burkina Faso |  | 1.20401 |  | 0.4948 |  | 2.433 |  | 0.015 |  | 3.3335 |  |
| CountryOfReturn: |  |  |  |  |  |  |  |  |  |  |  |
| Algerie – Lybie |  | 0.43928 |  | 0.2573 |  | 1.707 |  | 0.088 |  | 1.5516 |  |
| Autre – Lybie |  | 0.88911 |  | 0.2972 |  | 2.991 |  | 0.003 |  | 2.4330 |  |
| Maroc – Lybie |  | 0.90277 |  | 0.2793 |  | 3.232 |  | 0.001 |  | 2.4664 |  |
| Niger – Lybie |  | 0.22404 |  | 0.2797 |  | 0.801 |  | 0.423 |  | 1.2511 |  |
| BusinessMembers: |  |  |  |  |  |  |  |  |  |  |  |
| Moi et d'autres – Moi uniquement |  | 0.57009 |  | 0.2093 |  | 2.724 |  | 0.006 |  | 1.7684 |  |
| InterviewType: |  |  |  |  |  |  |  |  |  |  |  |
| Terrain/bureau OIM – Par téléphone |  | 0.51449 |  | 0.1920 |  | 2.679 |  | 0.007 |  | 1.6728 |  |
| FirstChoice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | -0.32450 |  | 0.2169 |  | -1.496 |  | 0.135 |  | 0.7229 |  |
| ReceivedSupportAs: |  |  |  |  |  |  |  |  |  |  |  |
| En nature – En espèces |  | 0.47739 |  | 0.2894 |  | 1.650 |  | 0.099 |  | 1.6119 |  |
| Mixte – En espèces |  | 0.39118 |  | 0.3405 |  | 1.149 |  | 0.251 |  | 1.4787 |  |
| ReceivedIOMBusinessAdvice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.16163 |  | 0.1842 |  | 0.877 |  | 0.380 |  | 1.1754 |  |
| EmployeeNumber: |  |  |  |  |  |  |  |  |  |  |  |
| 1 – 0 |  | -0.73216 |  | 0.6152 |  | -1.190 |  | 0.234 |  | 0.4809 |  |
| 1+ – 0 |  | -0.43515 |  | 0.6198 |  | -0.702 |  | 0.483 |  | 0.6472 |  |
| Gender: |  |  |  |  |  |  |  |  |  |  |  |
| Masculin – Féminin |  | 0.20060 |  | 0.2853 |  | 0.703 |  | 0.482 |  | 1.2221 |  |
| Disabled: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.22242 |  | 0.3657 |  | 0.608 |  | 0.543 |  | 1.2491 |  |
| CoronaImpactOnBusiness: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.09912 |  | 0.2127 |  | 0.466 |  | 0.641 |  | 1.1042 |  |
| BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Agriculture/aviculture |  | -0.09205 |  | 0.2931 |  | -0.314 |  | 0.754 |  | 0.9121 |  |
| Commerce – Agriculture/aviculture |  | -0.33794 |  | 0.2632 |  | -1.284 |  | 0.199 |  | 0.7132 |  |
| Elevage – Agriculture/aviculture |  | -0.20554 |  | 0.3251 |  | -0.632 |  | 0.527 |  | 0.8142 |  |
| Transport – Agriculture/aviculture |  | -0.24846 |  | 0.3542 |  | -0.702 |  | 0.483 |  | 0.7800 |  |
| BusinessHasEmployees: |  |  |  |  |  |  |  |  |  |  |  |
| Non – Autre |  | -0.17808 |  | 0.5686 |  | -0.313 |  | 0.754 |  | 0.8369 |  |
| MigrationDuration |  | 0.00701 |  | 0.0345 |  | 0.203 |  | 0.839 |  | 1.0070 |  |
| Note. Estimates represent the log odds of "WouldMigrateAgain = Yes" vs. "WouldMigrateAgain = No" | | | | | | | | | | | |
|  | | | | | | | | | | | |

| Collinearity Statistics | | | | | |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |
|  | | **VIF** | | **Tolerance** | |
| Country |  | 1.28 |  | 0.780 |  |
| CountryOfReturn |  | 1.09 |  | 0.913 |  |
| BusinessMembers |  | 1.18 |  | 0.847 |  |
| InterviewType |  | 1.17 |  | 0.852 |  |
| FirstChoice |  | 1.08 |  | 0.930 |  |
| ReceivedSupportAs |  | 1.26 |  | 0.796 |  |
| ReceivedIOMBusinessAdvice |  | 1.17 |  | 0.853 |  |
| EmployeeNumber |  | 1.79 |  | 0.558 |  |
| Gender |  | 1.08 |  | 0.927 |  |
| Disabled |  | 1.04 |  | 0.961 |  |
| CoronaImpactOnBusiness |  | 1.19 |  | 0.840 |  |
| BusinessType |  | 1.14 |  | 0.879 |  |
| BusinessHasEmployees |  | 3.06 |  | 0.327 |  |
| MigrationDuration |  | 1.03 |  | 0.971 |  |
|  | | | | | |

| Predictive Measures | |
| --- | --- |
|  |  |
| **Accuracy** | |
| 0.898 |  |
| Note. The cut-off value is set to 0.5 | |
|  | |

# Reintegration Sustainability Survey (RSS)

## Model 5: Determinants of Sustainable Reintegration (Composite Score)

Models 5 and 6 utilise yet another dataset, which is also a merger between Kobo data and Mimosa data. For more information, see the document data\_sets\_summary.doc.

Multiple linear regression was used to identify the determinants of Sustainable Reintegration. The dependent variable was the Composite Score of the RSS scale. Composite Score was approximately normally distributed, see Table 1 and Figure 7 below.

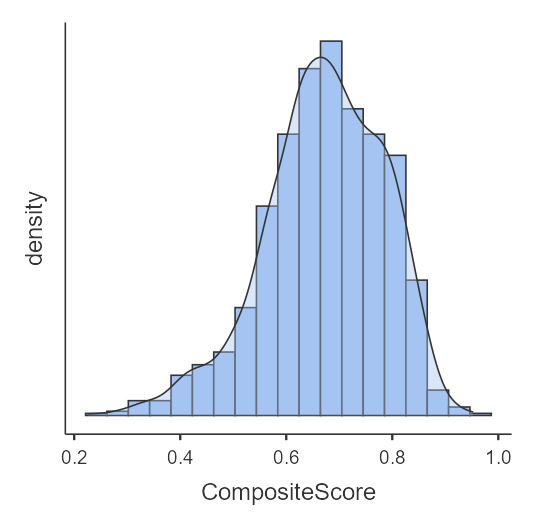
Table 1

Descriptive Statistics for Composite Score of Reintegration (N = 1,196)

|  |  |  |  |
| --- | --- | --- | --- |
| Mean |  | 0.672 |  |
| Median |  | 0.676 |  |
| Standard deviation |  | 0.113 |  |
| Minimum |  | 0.227 |  |
| Maximum |  | 0.952 |  |
|  | | | |

Figure 7

Distribution of Composite Score (N = 1,196)

 A picture containing screenshot, black, darkness

Description automatically generated

Fifteen variables were used as predictors of Composite Score. These predictors are listed in the Set of Tables 5. Ten of them were categorical variables, whereas 5 of them were continuous variables. As usual, some of the categorical variables were recoded to a smaller number of categories to achieve a sufficient number of observations in each category (see Appendix I on how these were recoded). Furthermore, 3 of these independent variables were computed especially for use in this model (and Model 6). They were:

|  |  |  |
| --- | --- | --- |
| Name in this document | Name in Mimosa/Kobo | Definition |
| Training Duration | TrainingStartDate (Mimosa) and  TrainingEndDate (Mimosa) | The duration of the training, in days. Similar to variable Training Duration in Model 3, but computed |
| MBSupportDuration | ArrivalDate (Mimosa) and  MicrobusinessEndDate (Mimosa) | The time lapse between arrival in the country and the end of the Microbusiness assistance, in days |
| MBAssistanceDuration | MicrobusinessEndDate (Mimosa) and  interview\_date (Kobo) | The time lapse between the end of the Microbusiness assistance and the interview date, in days |

Results showed that 6 variables were significant predictors of Composite Score, with the strongest predictors being MB Support Duration, Sex, Return Country, and Origin Country (all *p* < 0.001), followed by Financial Services (*p* < 0.01), and the Form of Business Assistance (*p* < 0.05). This model explained approximately 18% of all the variance (R-squared = 0.179).

Specifically, MB Support Duration seems to have a positive impact on sustainable reintegration (the longer the support duration, the higher the Composition Score). Furthermore, men have a significantly higher Composite Score than women, and respondents who received Financial Services have a significantly higher Composite Score than those who did not.

Finally, after controlling for all other variables, respondents who returned from Niger have the lowest Composite Score, whereas respondents whom origin country is Tchad have the lowest Composite Score. Although the Form of Business Assistance was a significant predictor, there are no significant differences between CAS and KND (or CAS, KND); the only significant is that respondents engaged in any of CAS or KND have a higher Composite Score than respondents whose Business Assistance Form is Unknow.

It is interesting to note that except for Financial Services, no other form of assistance seem to positively influence the Composite Score.

Set of Tables 5

Multiple Linear Regression for Composite RSS Score

| Model Fit Measures | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | **Overall Model Test** | | | | | | | |
| **Model** | | **R²** | | **F** | | **df1** | | **df2** | | **p** | |
| 1 |  | 0.179 |  | 11.6 |  | 22 |  | 1173 |  | < .001 |  |
|  | | | | | | | | | | | |

| Omnibus ANOVA Test | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
|  | | **Sum of Squares** | | **df** | | **Mean Square** | | **F** | | **p** | |
| MBSupportDuration |  | 0.24766 |  | 1 |  | 0.24766 |  | 23.1369 |  | < .001 |  |
| Sex |  | 0.24448 |  | 1 |  | 0.24448 |  | 22.8395 |  | < .001 |  |
| return\_country |  | 0.42019 |  | 3 |  | 0.14006 |  | 13.0848 |  | < .001 |  |
| origin\_country |  | 0.34853 |  | 4 |  | 0.08713 |  | 8.1400 |  | < .001 |  |
| FinancialServices |  | 0.10912 |  | 1 |  | 0.10912 |  | 10.1945 |  | 0.001 |  |
| MicrobusinessFormOfAssistance |  | 0.09943 |  | 3 |  | 0.03314 |  | 3.0963 |  | 0.026 |  |
| MedicalSupport |  | 0.03604 |  | 1 |  | 0.03604 |  | 3.3673 |  | 0.067 |  |
| migration\_duration |  | 0.02888 |  | 1 |  | 0.02888 |  | 2.6978 |  | 0.101 |  |
| MaterialAssistance |  | 0.01905 |  | 1 |  | 0.01905 |  | 1.7794 |  | 0.182 |  |
| PsychosocialSupport |  | 0.00914 |  | 1 |  | 0.00914 |  | 0.8536 |  | 0.356 |  |
| SocialSupport |  | 0.00899 |  | 1 |  | 0.00899 |  | 0.8396 |  | 0.360 |  |
| Training |  | 0.00548 |  | 1 |  | 0.00548 |  | 0.5120 |  | 0.474 |  |
| TrainingDuration |  | 0.00172 |  | 1 |  | 0.00172 |  | 0.1604 |  | 0.689 |  |
| MBAssistanceDuration |  | 6.12e-4 |  | 1 |  | 6.12e-4 |  | 0.0572 |  | 0.811 |  |
| age |  | 5.83e-4 |  | 1 |  | 5.83e-4 |  | 0.0545 |  | 0.815 |  |
| Residuals |  | 12.55601 |  | 1173 |  | 0.01070 |  |  |  |  |  |
| Note. Type 3 sum of squares | | | | | | | | | | | |
|  | | | | | | | | | | | |

| Model Coefficients - CompositeScore | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **t** | | **p** | |
| Intercept ᵃ |  | 0.42405 |  | 0.03435 |  | 12.344 |  | < .001 |  |
| MBSupportDuration |  | 2.56e-4 |  | 5.33e-5 |  | 4.810 |  | < .001 |  |
| sex: |  |  |  |  |  |  |  |  |  |
| Homme – Femme |  | 0.04435 |  | 0.00928 |  | 4.779 |  | < .001 |  |
| return\_country: |  |  |  |  |  |  |  |  |  |
| Algérie – Niger |  | 0.03541 |  | 0.01144 |  | 3.096 |  | 0.002 |  |
| Autre – Niger |  | 0.04967 |  | 0.00943 |  | 5.265 |  | < .001 |  |
| Libye – Niger |  | 0.05224 |  | 0.00962 |  | 5.433 |  | < .001 |  |
| origin\_country: |  |  |  |  |  |  |  |  |  |
| Autre – Tchad |  | 0.02314 |  | 0.01351 |  | 1.712 |  | 0.087 |  |
| Guinee Conakry – Tchad |  | 0.00762 |  | 0.01996 |  | 0.382 |  | 0.703 |  |
| Mali – Tchad |  | 0.06819 |  | 0.02285 |  | 2.984 |  | 0.003 |  |
| Niger – Tchad |  | 0.08385 |  | 0.01777 |  | 4.719 |  | < .001 |  |
| FinancialServices: |  |  |  |  |  |  |  |  |  |
| No – Yes |  | 0.03082 |  | 0.00965 |  | 3.193 |  | 0.001 |  |
| MicrobusinessFormOfAssistance: |  |  |  |  |  |  |  |  |  |
| CAS – Unknown |  | 0.04047 |  | 0.01723 |  | 2.349 |  | 0.019 |  |
| CAS, KND – Unknown |  | 0.03986 |  | 0.02134 |  | 1.867 |  | 0.062 |  |
| KND – Unknown |  | 0.04647 |  | 0.01536 |  | 3.025 |  | 0.003 |  |
| MedicalSupport: |  |  |  |  |  |  |  |  |  |
| No – Yes |  | 0.01758 |  | 0.00958 |  | 1.835 |  | 0.067 |  |
| migration\_duration |  | -8.98e−4 |  | 5.47e-4 |  | -1.642 |  | 0.101 |  |
| MaterialAssistance: |  |  |  |  |  |  |  |  |  |
| No – Yes |  | 0.02952 |  | 0.02213 |  | 1.334 |  | 0.182 |  |
| PsychosocialSupport: |  |  |  |  |  |  |  |  |  |
| Yes – No |  | 0.00705 |  | 0.00763 |  | 0.924 |  | 0.356 |  |
| SocialSupport: |  |  |  |  |  |  |  |  |  |
| Yes – No |  | 0.01584 |  | 0.01729 |  | 0.916 |  | 0.360 |  |
| Training: |  |  |  |  |  |  |  |  |  |
| Yes – No |  | 0.00588 |  | 0.00822 |  | 0.716 |  | 0.474 |  |
| TrainingDuration |  | 2.11e-4 |  | 5.27e-4 |  | 0.401 |  | 0.689 |  |
| MBAssistanceDuration |  | -1.22e−5 |  | 5.11e-5 |  | -0.239 |  | 0.811 |  |
| age |  | 9.63e-5 |  | 4.13e-4 |  | 0.233 |  | 0.815 |  |
| ᵃ Represents reference level | | | | | | | | | |
|  | | | | | | | | | |

| Collinearity Statistics | | | | | |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |
|  | | **VIF** | | **Tolerance** | |
| MBSupportDuration |  | 1.51 |  | 0.661 |  |
| sex |  | 1.08 |  | 0.928 |  |
| return\_country |  | 1.23 |  | 0.811 |  |
| origin\_country |  | 1.64 |  | 0.608 |  |
| FinancialServices |  | 1.46 |  | 0.684 |  |
| MicrobusinessFormOfAssistance |  | 1.43 |  | 0.698 |  |
| MedicalSupport |  | 1.18 |  | 0.849 |  |
| migration\_duration |  | 1.17 |  | 0.857 |  |
| MaterialAssistance |  | 2.48 |  | 0.404 |  |
| PsychosocialSupport |  | 1.23 |  | 0.815 |  |
| SocialSupport |  | 2.15 |  | 0.466 |  |
| Training |  | 1.37 |  | 0.728 |  |
| TrainingDuration |  | 1.14 |  | 0.876 |  |
| MBAssistanceDuration |  | 1.40 |  | 0.716 |  |
| age |  | 1.09 |  | 0.919 |  |
|  | | | | | |

## Model 6: Determinants of Sustainable Reintegration (Economic Score)

Multiple linear regression was used to identify the determinants of Sustainable Reintegration. The dependent variable was the Economic Score of the RSS scale. Economic Score was approximately normally distributed, see Table 2 and Figure 8 below.

Table 2

Descriptive Statistics for Economic Score of Reintegration (N = 1,196)

|  |  |  |  |
| --- | --- | --- | --- |
| Mean |  | 0.625 |  |
| Median |  | 0.640 |  |
| Standard deviation |  | 0.168 |  |
| Minimum |  | 0.117 |  |
| Maximum |  | 0.970 |  |
|  | | | |

Figure 8

Distribution of Economic Score (N = 1,196)

A picture containing screenshot

Description automatically generated A picture containing screenshot, black, square, rectangle

Description automatically generated

Fifteen variables were used as predictors of Economic Score. These predictors are listed in the Set of Tables 5. Ten of them were categorical variables, whereas 5 of them were continuous variables. As usual, some of the categorical variables were recoded to a smaller number of categories to achieve a sufficient number of observations in each category (see Appendix I on how these were recoded).

Model 6 replicated some of the results of Model 5, with the strongest predictors of Economic Score being MB Support Duration (the longer the support, the higher the Economic Score), Return Country (lowest scores in Niger), and Origin Country (lowest scores in Tchad), all at *p* < 0.001. Likewise, the Form of Business Assistance was significant (*p* < 0.01) with, again, the only difference being between any form of assistance and Unknown form of assistance.

There were, however, interesting differences compared to Model 5. In Model 6, Sex and Financial Services were no longer significant, whereas Material Assistance was significant (p < 0.05). Furthermore, the direction of the effect for Material Assistance is surprising, since respondents who did not receive it tend to have a significantly higher Economic Score than those who did receive such assistance.

This model explained approximately 11% of all the variance (R-squared = 0.114), meaning it was less performant than Model 5. We also note, again, that only one (Material Assistance) of the assistance variables was significant, and in a negative direction.

Set of Tables 6

Multiple Linear Regression for Economic RSS Score

| Model Fit Measures | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | **Overall Model Test** | | | | | | | |
| **Model** | | **R²** | | **F** | | **df1** | | **df2** | | **p** | |
| 1 |  | 0.114 |  | 6.84 |  | 22 |  | 1173 |  | < .001 |  |
|  | | | | | | | | | | | |

| Omnibus ANOVA Test | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
|  | | **Sum of Squares** | | **df** | | **Mean Square** | | **F** | | **p** | |
| MBSupportDuration |  | 0.3394 |  | 1 |  | 0.3394 |  | 13.31142 |  | < .001 |  |
| return\_country |  | 0.7538 |  | 3 |  | 0.2513 |  | 9.85433 |  | < .001 |  |
| origin\_country |  | 0.6415 |  | 4 |  | 0.1604 |  | 6.29027 |  | < .001 |  |
| MicrobusinessFormOfAssistance |  | 0.3415 |  | 3 |  | 0.1138 |  | 4.46479 |  | 0.004 |  |
| MBAssistanceDuration |  | 0.1142 |  | 1 |  | 0.1142 |  | 4.47980 |  | 0.035 |  |
| MaterialAssistance |  | 0.1044 |  | 1 |  | 0.1044 |  | 4.09300 |  | 0.043 |  |
| migration\_duration |  | 0.0706 |  | 1 |  | 0.0706 |  | 2.76945 |  | 0.096 |  |
| FinancialServices |  | 0.0696 |  | 1 |  | 0.0696 |  | 2.73081 |  | 0.099 |  |
| sex |  | 0.0597 |  | 1 |  | 0.0597 |  | 2.34217 |  | 0.126 |  |
| MedicalSupport |  | 0.0597 |  | 1 |  | 0.0597 |  | 2.34297 |  | 0.126 |  |
| PsychosocialSupport |  | 0.0432 |  | 1 |  | 0.0432 |  | 1.69245 |  | 0.194 |  |
| Training |  | 0.0170 |  | 1 |  | 0.0170 |  | 0.66674 |  | 0.414 |  |
| SocialSupport |  | 0.0164 |  | 1 |  | 0.0164 |  | 0.64321 |  | 0.423 |  |
| age |  | 0.0130 |  | 1 |  | 0.0130 |  | 0.50990 |  | 0.475 |  |
| TrainingDuration |  | 4.33e-5 |  | 1 |  | 4.33e-5 |  | 0.00170 |  | 0.967 |  |
| Residuals |  | 29.9081 |  | 1173 |  | 0.0255 |  |  |  |  |  |
| Note. Type 3 sum of squares | | | | | | | | | | | |
|  | | | | | | | | | | | |

| Model Coefficients - EconomicScore | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **t** | | **p** | |
| Intercept ᵃ |  | 0.33007 |  | 0.0530 |  | 6.2257 |  | < .001 |  |
| MBSupportDuration |  | 3.00e-4 |  | 8.22e-5 |  | 3.6485 |  | < .001 |  |
| return\_country: |  |  |  |  |  |  |  |  |  |
| Algérie – Niger |  | 0.02990 |  | 0.0177 |  | 1.6932 |  | 0.091 |  |
| Autre – Niger |  | 0.05613 |  | 0.0146 |  | 3.8548 |  | < .001 |  |
| Libye – Niger |  | 0.07602 |  | 0.0148 |  | 5.1220 |  | < .001 |  |
| origin\_country: |  |  |  |  |  |  |  |  |  |
| Autre – Tchad |  | 0.01916 |  | 0.0209 |  | 0.9189 |  | 0.358 |  |
| Guinee Conakry – Tchad |  | 0.03986 |  | 0.0308 |  | 1.2937 |  | 0.196 |  |
| Mali – Tchad |  | 0.15862 |  | 0.0353 |  | 4.4980 |  | < .001 |  |
| Niger – Tchad |  | 0.04699 |  | 0.0274 |  | 1.7139 |  | 0.087 |  |
| MicrobusinessFormOfAssistance: |  |  |  |  |  |  |  |  |  |
| CAS – Unknown |  | 0.06473 |  | 0.0266 |  | 2.4346 |  | 0.015 |  |
| CAS, KND – Unknown |  | 0.07599 |  | 0.0329 |  | 2.3070 |  | 0.021 |  |
| KND – Unknown |  | 0.08420 |  | 0.0237 |  | 3.5514 |  | < .001 |  |
| MBAssistanceDuration |  | -1.67e−4 |  | 7.89e-5 |  | -2.1166 |  | 0.035 |  |
| MaterialAssistance: |  |  |  |  |  |  |  |  |  |
| No – Yes |  | 0.06911 |  | 0.0342 |  | 2.0231 |  | 0.043 |  |
| migration\_duration |  | -0.00140 |  | 8.44e-4 |  | -1.6642 |  | 0.096 |  |
| FinancialServices: |  |  |  |  |  |  |  |  |  |
| No – Yes |  | 0.02462 |  | 0.0149 |  | 1.6525 |  | 0.099 |  |
| sex: |  |  |  |  |  |  |  |  |  |
| Homme – Femme |  | 0.02192 |  | 0.0143 |  | 1.5304 |  | 0.126 |  |
| MedicalSupport: |  |  |  |  |  |  |  |  |  |
| No – Yes |  | 0.02263 |  | 0.0148 |  | 1.5307 |  | 0.126 |  |
| PsychosocialSupport: |  |  |  |  |  |  |  |  |  |
| Yes – No |  | 0.01532 |  | 0.0118 |  | 1.3009 |  | 0.194 |  |
| Training: |  |  |  |  |  |  |  |  |  |
| Yes – No |  | -0.01036 |  | 0.0127 |  | -0.8165 |  | 0.414 |  |
| SocialSupport: |  |  |  |  |  |  |  |  |  |
| Yes – No |  | 0.02140 |  | 0.0267 |  | 0.8020 |  | 0.423 |  |
| age |  | 4.55e-4 |  | 6.37e-4 |  | 0.7141 |  | 0.475 |  |
| TrainingDuration |  | 3.35e-5 |  | 8.14e-4 |  | 0.0412 |  | 0.967 |  |
| ᵃ Represents reference level | | | | | | | | | |
|  | | | | | | | | | |

| Collinearity Statistics | | | | | |
| --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |
|  | | **VIF** | | **Tolerance** | |
| MBSupportDuration |  | 1.51 |  | 0.661 |  |
| return\_country |  | 1.23 |  | 0.811 |  |
| origin\_country |  | 1.64 |  | 0.608 |  |
| MicrobusinessFormOfAssistance |  | 1.43 |  | 0.698 |  |
| MBAssistanceDuration |  | 1.40 |  | 0.716 |  |
| MaterialAssistance |  | 2.48 |  | 0.404 |  |
| migration\_duration |  | 1.17 |  | 0.857 |  |
| FinancialServices |  | 1.46 |  | 0.684 |  |
| sex |  | 1.08 |  | 0.928 |  |
| MedicalSupport |  | 1.18 |  | 0.849 |  |
| PsychosocialSupport |  | 1.23 |  | 0.815 |  |
| Training |  | 1.37 |  | 0.728 |  |
| SocialSupport |  | 2.15 |  | 0.466 |  |
| age |  | 1.09 |  | 0.919 |  |
| TrainingDuration |  | 1.14 |  | 0.876 |  |
|  | | | | | |

# Supplementary Analysis (RES)

## Model 7: Determinants of Employee Number

Another aspect of successful reintegration is whether the micro businesses launched by the respondents create new jobs. Likewise, one might wonder if some activities are more likely to create new jobs, while controlling for business success and profitability (indeed, more employees does not necessarily mean a higher business success).

To find out, logistic regression was used to identify the determinants of employee number. The dependent variable was Employee Number (“Si oui, combien des personnes sont employées par votre entreprise ?”). Business Success initially had 5 possible outcomes (Figure 9), but was recoded to 3 outcomes (Figure 10) to obtain a balanced sample with a sufficient number of observations in each category.

Figure 9

Proportion of outcomes of Employee Number (N = 408)

A picture containing black, darkness

Description automatically generated

Figure 10

Proportion of outcomes of Employee Number (recoded, N = 1,917)

A picture containing black, darkness

Description automatically generated

*Note*. All respondents who reported not having employees were coded as 0.

Four variables were used as independent variables. They were Business Success, Business Profitability, Country, and Business Type. This design allows us to explore whether some business activities or countries are more likely to create new jobs, while controlling for the success of the business. We did not use more variables due to sample imbalance.

Results showed that these 4 independent variables were significant predictors of Employee Number. Starting with the control variables, respondents who reported a High Business Success were more likely to have 1 or more than 1 employee than those who reported a Low Business Success. Respondents who reported a High Business Profitability were also more likely to have more than 1 employee than no employee, however, they were not more likely to have 1 employee than no employee. Overall, these results are in line with Model 1 and Model 2.

Burkina Faso is the country where it is least likely that respondents will have employees. For example, respondents in Ghana are more than 5 times more likely to have 1 employee than no employee compared to respondents in Burkina Faso, and respondents in Guinea are more than 7 times more likely to have 1+ employees than no employee compared to respondents in Burkina Faso.

Looking now at our main variable of interest, which is the business type, respondents engaged in trade (Commerce) seem the least likely to have employees. For example, respondents in agriculture or aviculture are 2 times more likely to have 1 employee than no employee compared to those in trade, and 4 times more likely to have 1+ employees than no employee compared to those in trade. The only exception is that respondents in transport are less likely to have 1+ employees than respondents in trade, although there is no difference between when it come to those who have only 1 employee.

Set of Tables 7

Multinomial Logistic Regression for Employee Number

| Model Fit Measures | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | | | **Overall Model Test** | | | | | |
| **Model** | | **AIC** | | **R²McF** | | **χ²** | | **df** | | **p** | |
| 1 |  | 2320 |  | 0.0997 |  | 252 |  | 22 |  | < .001 |  |
|  | | | | | | | | | | | |

| Omnibus Likelihood Ratio Tests | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- |
| **Predictor** | | **χ²** | | **df** | | **p** | |
| BusinessSuccess |  | 28.2 |  | 2 |  | < .001 |  |
| BusinessProfitability |  | 13.1 |  | 2 |  | 0.001 |  |
| Country |  | 65.7 |  | 10 |  | < .001 |  |
| BusinessType |  | 115.5 |  | 8 |  | < .001 |  |
|  | | | | | | | |

| Model Coefficients - EmployeeNumber | | | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
| **EmployeeNumber** | | **Predictor** | | **Estimate** | | **SE** | | **Z** | | **p** | | **Odds ratio** | |
| 1 - 0 |  | Intercept |  | -3.8271 |  | 0.388 |  | -9.8703 |  | < .001 |  | 0.02177 |  |
|  |  | BusinessSuccess: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | High – Low |  | 0.8733 |  | 0.183 |  | 4.7729 |  | < .001 |  | 2.39482 |  |
|  |  | BusinessProfitability: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | High – Low |  | 0.0152 |  | 0.168 |  | 0.0906 |  | 0.928 |  | 1.01535 |  |
|  |  | Country: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | Autre – Burkina Faso |  | 1.7699 |  | 0.387 |  | 4.5735 |  | < .001 |  | 5.87023 |  |
|  |  | Côte D'Ivoire – Burkina Faso |  | 1.2384 |  | 0.404 |  | 3.0668 |  | 0.002 |  | 3.44997 |  |
|  |  | Ghana – Burkina Faso |  | 1.7310 |  | 0.392 |  | 4.4203 |  | < .001 |  | 5.64633 |  |
|  |  | Guinée – Burkina Faso |  | 1.3090 |  | 0.411 |  | 3.1853 |  | 0.001 |  | 3.70248 |  |
|  |  | Sénégal – Burkina Faso |  | 0.8093 |  | 0.381 |  | 2.1213 |  | 0.034 |  | 2.24628 |  |
|  |  | BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | Agriculture/aviculture – Commerce |  | 0.8559 |  | 0.247 |  | 3.4595 |  | < .001 |  | 2.35346 |  |
|  |  | Autre – Commerce |  | 0.4945 |  | 0.203 |  | 2.4401 |  | 0.015 |  | 1.63970 |  |
|  |  | Elevage – Commerce |  | 0.0648 |  | 0.269 |  | 0.2408 |  | 0.810 |  | 1.06695 |  |
|  |  | Transport – Commerce |  | 0.2735 |  | 0.236 |  | 1.1577 |  | 0.247 |  | 1.31457 |  |
| 1+ - 0 |  | Intercept |  | -5.0569 |  | 0.521 |  | -9.7106 |  | < .001 |  | 0.00637 |  |
|  |  | BusinessSuccess: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | High – Low |  | 0.5940 |  | 0.223 |  | 2.6581 |  | 0.008 |  | 1.81131 |  |
|  |  | BusinessProfitability: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | High – Low |  | 0.7572 |  | 0.213 |  | 3.5493 |  | < .001 |  | 2.13234 |  |
|  |  | Country: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | Autre – Burkina Faso |  | 1.6345 |  | 0.531 |  | 3.0771 |  | 0.002 |  | 5.12676 |  |
|  |  | Côte D'Ivoire – Burkina Faso |  | 1.7718 |  | 0.519 |  | 3.4120 |  | < .001 |  | 5.88160 |  |
|  |  | Ghana – Burkina Faso |  | 0.9782 |  | 0.555 |  | 1.7635 |  | 0.078 |  | 2.65956 |  |
|  |  | Guinée – Burkina Faso |  | 2.0277 |  | 0.534 |  | 3.7969 |  | < .001 |  | 7.59684 |  |
|  |  | Sénégal – Burkina Faso |  | 1.4929 |  | 0.497 |  | 3.0059 |  | 0.003 |  | 4.44995 |  |
|  |  | BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
|  |  | Agriculture/aviculture – Commerce |  | 1.4636 |  | 0.275 |  | 5.3153 |  | < .001 |  | 4.32137 |  |
|  |  | Autre – Commerce |  | 1.6601 |  | 0.221 |  | 7.5139 |  | < .001 |  | 5.25995 |  |
|  |  | Elevage – Commerce |  | 0.5875 |  | 0.326 |  | 1.8021 |  | 0.072 |  | 1.79950 |  |
|  |  | Transport – Commerce |  | -1.7313 |  | 0.509 |  | -3.4019 |  | < .001 |  | 0.17706 |  |
|  | | | | | | | | | | | | | |

# Appendix I: Interaction of Country and Business Type for Model 1

| Model Fit Measures | | | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | | | | | **Overall Model Test** | | | | | |
| **Model** | | **Deviance** | | **AIC** | | **R²McF** | | **χ²** | | **df** | | **p** | |
| 1 |  | 2204 |  | 2298 |  | 0.158 |  | 412 |  | 46 |  | < .001 |  |
|  | | | | | | | | | | | | | |

| Omnibus Likelihood Ratio Tests | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |
| **Predictor** | | **χ²** | | **df** | | **p** | |
| Country |  | 16.840 |  | 5 |  | 0.005 |  |
| EmployeeNumber |  | 43.057 |  | 2 |  | < .001 |  |
| BusinessType |  | 19.239 |  | 4 |  | < .001 |  |
| FirstChoice |  | 26.570 |  | 1 |  | < .001 |  |
| ReceivedIOMBusinessAdvice |  | 12.371 |  | 1 |  | < .001 |  |
| AgeGroup |  | 9.506 |  | 1 |  | 0.002 |  |
| CountryOfReturn |  | 7.620 |  | 4 |  | 0.107 |  |
| BusinessMembers |  | 6.812 |  | 1 |  | 0.009 |  |
| Gender |  | 7.832 |  | 1 |  | 0.005 |  |
| ReceivedSupportAs |  | 3.011 |  | 2 |  | 0.222 |  |
| Disabled |  | 3.055 |  | 1 |  | 0.081 |  |
| InterviewType |  | 0.575 |  | 1 |  | 0.448 |  |
| MigrationDuration |  | 0.256 |  | 1 |  | 0.613 |  |
| CoronaImpactOnBusiness |  | 0.119 |  | 1 |  | 0.730 |  |
| Country ✻ BusinessType |  | 31.278 |  | 20 |  | 0.052 |  |
|  | | | | | | | |

| Model Coefficients - BusinessSuccess | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
| **Predictor** | | **Estimate** | | **SE** | | **Z** | | **p** | | **Odds ratio** | |
| Intercept |  | -2.9926 |  | 0.4749 |  | -6.30161 |  | < .001 |  | 0.0502 |  |
| Country: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Côte D'Ivoire |  | 0.8206 |  | 0.6642 |  | 1.23551 |  | 0.217 |  | 2.2719 |  |
| Burkina Faso – Côte D'Ivoire |  | 0.8599 |  | 0.6855 |  | 1.25428 |  | 0.210 |  | 2.3628 |  |
| Ghana – Côte D'Ivoire |  | 3.5232 |  | 1.1304 |  | 3.11681 |  | 0.002 |  | 33.8938 |  |
| Guinée – Côte D'Ivoire |  | 1.0237 |  | 1.4928 |  | 0.68578 |  | 0.493 |  | 2.7835 |  |
| Sénégal – Côte D'Ivoire |  | 0.7436 |  | 0.4419 |  | 1.68272 |  | 0.092 |  | 2.1035 |  |
| EmployeeNumber: |  |  |  |  |  |  |  |  |  |  |  |
| 1 – 0 |  | 1.0172 |  | 0.1867 |  | 5.44691 |  | < .001 |  | 2.7654 |  |
| 1+ – 0 |  | 0.9025 |  | 0.2113 |  | 4.27094 |  | < .001 |  | 2.4657 |  |
| BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Agriculture/aviculture |  | 0.9545 |  | 0.4707 |  | 2.02769 |  | 0.043 |  | 2.5974 |  |
| Commerce – Agriculture/aviculture |  | 1.5809 |  | 0.4161 |  | 3.79899 |  | < .001 |  | 4.8595 |  |
| Elevage – Agriculture/aviculture |  | 0.8992 |  | 0.6254 |  | 1.43782 |  | 0.150 |  | 2.4577 |  |
| Transport – Agriculture/aviculture |  | 2.6443 |  | 1.1562 |  | 2.28709 |  | 0.022 |  | 14.0739 |  |
| FirstChoice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.7828 |  | 0.1541 |  | 5.08132 |  | < .001 |  | 2.1875 |  |
| ReceivedIOMBusinessAdvice: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.4296 |  | 0.1226 |  | 3.50380 |  | < .001 |  | 1.5367 |  |
| AgeGroup: |  |  |  |  |  |  |  |  |  |  |  |
| 36+ – 14-35 |  | -0.4390 |  | 0.1430 |  | -3.06889 |  | 0.002 |  | 0.6447 |  |
| CountryOfReturn: |  |  |  |  |  |  |  |  |  |  |  |
| Autre – Algerie |  | -0.2255 |  | 0.2106 |  | -1.07039 |  | 0.284 |  | 0.7982 |  |
| Lybie – Algerie |  | 0.2809 |  | 0.1597 |  | 1.75855 |  | 0.079 |  | 1.3243 |  |
| Maroc – Algerie |  | 0.1460 |  | 0.1793 |  | 0.81449 |  | 0.415 |  | 1.1572 |  |
| Niger – Algerie |  | 0.1553 |  | 0.1587 |  | 0.97867 |  | 0.328 |  | 1.1680 |  |
| BusinessMembers: |  |  |  |  |  |  |  |  |  |  |  |
| Moi uniquement – Moi et d'autres |  | 0.4138 |  | 0.1590 |  | 2.60229 |  | 0.009 |  | 1.5126 |  |
| Gender: |  |  |  |  |  |  |  |  |  |  |  |
| Masculin – Féminin |  | 0.5170 |  | 0.1857 |  | 2.78464 |  | 0.005 |  | 1.6771 |  |
| ReceivedSupportAs: |  |  |  |  |  |  |  |  |  |  |  |
| En nature – En espèces |  | -0.2789 |  | 0.1844 |  | -1.51218 |  | 0.130 |  | 0.7566 |  |
| Mixte – En espèces |  | -0.3017 |  | 0.2046 |  | -1.47451 |  | 0.140 |  | 0.7396 |  |
| Disabled: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | -0.4260 |  | 0.2452 |  | -1.73688 |  | 0.082 |  | 0.6531 |  |
| InterviewType: |  |  |  |  |  |  |  |  |  |  |  |
| Terrain/bureau OIM – Par téléphone |  | 0.1024 |  | 0.1352 |  | 0.75757 |  | 0.449 |  | 1.1078 |  |
| MigrationDuration |  | -0.0124 |  | 0.0245 |  | -0.50593 |  | 0.613 |  | 0.9877 |  |
| CoronaImpactOnBusiness: |  |  |  |  |  |  |  |  |  |  |  |
| Oui – Non |  | 0.0491 |  | 0.1423 |  | 0.34512 |  | 0.730 |  | 1.0504 |  |
| Country ✻ BusinessType: |  |  |  |  |  |  |  |  |  |  |  |
| (Autre – Côte D'Ivoire) ✻ (Autre – Agriculture/aviculture) |  | -0.6576 |  | 0.7771 |  | -0.84616 |  | 0.397 |  | 0.5181 |  |
| (Burkina Faso – Côte D'Ivoire) ✻ (Autre – Agriculture/aviculture) |  | -0.4685 |  | 0.8666 |  | -0.54064 |  | 0.589 |  | 0.6259 |  |
| (Ghana – Côte D'Ivoire) ✻ (Autre – Agriculture/aviculture) |  | -1.2053 |  | 1.2183 |  | -0.98938 |  | 0.322 |  | 0.2996 |  |
| (Guinée – Côte D'Ivoire) ✻ (Autre – Agriculture/aviculture) |  | -0.7103 |  | 1.5556 |  | -0.45661 |  | 0.648 |  | 0.4915 |  |
| (Sénégal – Côte D'Ivoire) ✻ (Autre – Agriculture/aviculture) |  | -0.4844 |  | 0.5603 |  | -0.86456 |  | 0.387 |  | 0.6160 |  |
| (Autre – Côte D'Ivoire) ✻ (Commerce – Agriculture/aviculture) |  | -1.3086 |  | 0.6984 |  | -1.87359 |  | 0.061 |  | 0.2702 |  |
| (Burkina Faso – Côte D'Ivoire) ✻ (Commerce – Agriculture/aviculture) |  | -0.9320 |  | 0.7555 |  | -1.23353 |  | 0.217 |  | 0.3938 |  |
| (Ghana – Côte D'Ivoire) ✻ (Commerce – Agriculture/aviculture) |  | -1.6919 |  | 1.1899 |  | -1.42189 |  | 0.155 |  | 0.1842 |  |
| (Guinée – Côte D'Ivoire) ✻ (Commerce – Agriculture/aviculture) |  | -0.4299 |  | 1.5228 |  | -0.28232 |  | 0.778 |  | 0.6506 |  |
| (Sénégal – Côte D'Ivoire) ✻ (Commerce – Agriculture/aviculture) |  | -0.6117 |  | 0.4845 |  | -1.26259 |  | 0.207 |  | 0.5424 |  |
| (Autre – Côte D'Ivoire) ✻ (Elevage – Agriculture/aviculture) |  | -1.3738 |  | 0.9885 |  | -1.38978 |  | 0.165 |  | 0.2531 |  |
| (Burkina Faso – Côte D'Ivoire) ✻ (Elevage – Agriculture/aviculture) |  | -0.4614 |  | 0.8568 |  | -0.53850 |  | 0.590 |  | 0.6304 |  |
| (Ghana – Côte D'Ivoire) ✻ (Elevage – Agriculture/aviculture) |  | 12.3371 |  | 275.0595 |  | 0.04485 |  | 0.964 |  | 228000.4408 |  |
| (Guinée – Côte D'Ivoire) ✻ (Elevage – Agriculture/aviculture) |  | -0.0214 |  | 1.7283 |  | -0.01236 |  | 0.990 |  | 0.9789 |  |
| (Sénégal – Côte D'Ivoire) ✻ (Elevage – Agriculture/aviculture) |  | -0.2650 |  | 0.6978 |  | -0.37975 |  | 0.704 |  | 0.7672 |  |
| (Autre – Côte D'Ivoire) ✻ (Transport – Agriculture/aviculture) |  | -0.7792 |  | 1.4446 |  | -0.53939 |  | 0.590 |  | 0.4588 |  |
| (Burkina Faso – Côte D'Ivoire) ✻ (Transport – Agriculture/aviculture) |  | 14.3192 |  | 1455.3981 |  | 0.00984 |  | 0.992 |  | 1.65e+6 |  |
| (Ghana – Côte D'Ivoire) ✻ (Transport – Agriculture/aviculture) |  | -1.6862 |  | 1.8700 |  | -0.90171 |  | 0.367 |  | 0.1852 |  |
| (Guinée – Côte D'Ivoire) ✻ (Transport – Agriculture/aviculture) |  | -0.8538 |  | 1.8727 |  | -0.45592 |  | 0.648 |  | 0.4258 |  |
| (Sénégal – Côte D'Ivoire) ✻ (Transport – Agriculture/aviculture) |  | -2.4466 |  | 1.2368 |  | -1.97815 |  | 0.048 |  | 0.0866 |  |
| Note. Estimates represent the log odds of "BusinessSuccess = High" vs. "BusinessSuccess = Low" | | | | | | | | | | | |
|  | | | | | | | | | | | |

**Estimated Marginal Means**

**Country ✻ BusinessType**

A picture containing screenshot, darkness

Description automatically generated

*Note*. Results for Burkina Faso for transport should be ignore since only 1 respondent was involved in transport.

| Estimated Marginal Means - Country ✻ BusinessType | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  | | | | | | | | **95% Confidence Interval** | | | |
| **BusinessType** | | **Country** | | **Probability** | | **SE** | | **Lower** | | **Upper** | |
| Agriculture/aviculture |  | Côte D'Ivoire |  | 0.143 |  | 0.0491 |  | 0.0710 |  | 0.268 |  |
|  |  | Autre |  | 0.275 |  | 0.1141 |  | 0.1102 |  | 0.538 |  |
|  |  | Burkina Faso |  | 0.283 |  | 0.1205 |  | 0.1099 |  | 0.558 |  |
|  |  | Ghana |  | 0.850 |  | 0.1381 |  | 0.4039 |  | 0.979 |  |
|  |  | Guinée |  | 0.318 |  | 0.3159 |  | 0.0261 |  | 0.890 |  |
|  |  | Sénégal |  | 0.260 |  | 0.0573 |  | 0.1641 |  | 0.387 |  |
| Autre |  | Côte D'Ivoire |  | 0.303 |  | 0.0722 |  | 0.1817 |  | 0.459 |  |
|  |  | Autre |  | 0.338 |  | 0.0762 |  | 0.2078 |  | 0.499 |  |
|  |  | Burkina Faso |  | 0.391 |  | 0.1187 |  | 0.1947 |  | 0.631 |  |
|  |  | Ghana |  | 0.815 |  | 0.0634 |  | 0.6592 |  | 0.910 |  |
|  |  | Guinée |  | 0.373 |  | 0.0866 |  | 0.2233 |  | 0.551 |  |
|  |  | Sénégal |  | 0.360 |  | 0.0699 |  | 0.2370 |  | 0.505 |  |
| Commerce |  | Côte D'Ivoire |  | 0.448 |  | 0.0646 |  | 0.3275 |  | 0.576 |  |
|  |  | Autre |  | 0.333 |  | 0.0535 |  | 0.2372 |  | 0.445 |  |
|  |  | Burkina Faso |  | 0.431 |  | 0.0845 |  | 0.2779 |  | 0.598 |  |
|  |  | Ghana |  | 0.835 |  | 0.0558 |  | 0.6962 |  | 0.918 |  |
|  |  | Guinée |  | 0.595 |  | 0.0725 |  | 0.4493 |  | 0.726 |  |
|  |  | Sénégal |  | 0.481 |  | 0.0622 |  | 0.3627 |  | 0.602 |  |
| Elevage |  | Côte D'Ivoire |  | 0.291 |  | 0.1107 |  | 0.1256 |  | 0.540 |  |
|  |  | Autre |  | 0.191 |  | 0.0908 |  | 0.0696 |  | 0.428 |  |
|  |  | Burkina Faso |  | 0.380 |  | 0.0630 |  | 0.2660 |  | 0.508 |  |
|  |  | Ghana |  | 1.000 |  | 8.66e-5 |  | 2.22e-16 |  | 1.000 |  |
|  |  | Guinée |  | 0.528 |  | 0.1814 |  | 0.2119 |  | 0.823 |  |
|  |  | Sénégal |  | 0.399 |  | 0.0753 |  | 0.2638 |  | 0.551 |  |
| Transport |  | Côte D'Ivoire |  | 0.702 |  | 0.2327 |  | 0.2102 |  | 0.954 |  |
|  |  | Autre |  | 0.710 |  | 0.1457 |  | 0.3797 |  | 0.908 |  |
|  |  | Burkina Faso |  | 1.000 |  | 1.58e-4 |  | 2.22e-16 |  | 1.000 |  |
|  |  | Ghana |  | 0.937 |  | 0.0626 |  | 0.6519 |  | 0.991 |  |
|  |  | Guinée |  | 0.736 |  | 0.0565 |  | 0.6120 |  | 0.831 |  |
|  |  | Sénégal |  | 0.300 |  | 0.0936 |  | 0.1518 |  | 0.507 |  |
|  | | | | | | | | | | | |

| Predictive Measures | |
| --- | --- |
|  |  |
| **Accuracy** | |
| 0.694 |  |
| Note. The cut-off value is set to 0.5 | |
|  | |

# Appendix II: Correlations Between RSS Scores

A picture containing text, diagram, sketch

Description automatically generated

| Correlation Matrix | | | | | | | | | | | |
| --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- | --- |
|  |  |  |  |  |  |  |  |  |  |  |  |
|  | |  | | **Economic Score** | | **Social Score** | | **PsychoSocial Score** | | **Composite Score** | |
| Economic Score |  | Pearson's r |  | — |  |  |  |  |  |  |  |
|  |  | p-value |  | — |  |  |  |  |  |  |  |
| Social Score |  | Pearson's r |  | 0.349 |  | — |  |  |  |  |  |
|  |  | p-value |  | < .001 |  | — |  |  |  |  |  |
| PsychoSocial Score |  | Pearson's r |  | 0.410 |  | 0.316 |  | — |  |  |  |
|  |  | p-value |  | < .001 |  | < .001 |  | — |  |  |  |
| Composite Score |  | Pearson's r |  | 0.790 |  | 0.689 |  | 0.740 |  | — |  |
|  |  | p-value |  | < .001 |  | < .001 |  | < .001 |  | — |  |
|  | | | | | | | | | | | |

1. Although respondents who have 1 employee were more likely to report Business Success than respondents who have more than 1 employee, but less likely to report Business Profitability than respondents who have more than 1 employee, this difference was not statistically significant. [↑](#footnote-ref-1)
2. These variables on training were available in Mimosa, which is why we use this slightly different dataset. [↑](#footnote-ref-2)