**Supplemental Material 4.** Crude and fully-adjusted models of complementary feeding indicators in Indonesia, 2017

|  |  |  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- | --- | --- |
| Variables | ISSSF, n=747 | | MDD, n=4804 | | MMF, n=4804 | | MAD, n=4804 | |
| Model I | Model II | Model I | Model II | Model I | Model II | Model I | Model II |
| *Individual level* |  |  |  |  |  |  |  |  |
| Mother’s age, years  15-19  20-34  35-49 | 1.05(0.94-1.17)  Ref  1.00(0.92-1.09) | 1.10(0.98-1.24)  Ref  0.99(0.91-1.08) | 1.00(0.82-1.22)  Ref  0.96(0.89-1.04) | 1.19(0.99-1.44)  Ref  0.95(0.87-1.03) | 0.97(0.85-1.11)  Ref  0.95(0.90-1.00) | 0.99 (0.87-1.13)  Ref  0.98 (0.92-1.04) | 0.92(0.68-1.24)  Ref  0.94(0.85-1.05) | 1.11 (0.83-1.50)  Ref  0.97 (0.85-1.09) |
| Mother’s education  No formal education/ primary  Secondary school  College/ higher | Ref  1.06(0.96-1.16)  1.04(0.93-1.17) | Ref  1.02(0.91-1.13)  0.99(0.86-1.14) | Ref  1.23(1.12-1.35)\*\*\*  1.56(1.41-1.72)\*\*\* | Ref  1.06(0.96-1.17)  1.16(1.02-1.33)\* | Ref  1.13(1.06-1.21)\*\*\*  1.19(1.11-2.28)\*\*\* | Ref  1.06 (0.99-1.14)  1.05 (0.96-1.15) | Ref  1.36(1.19-1.56)\*\*\*  1.82(1.57-2.11)\*\*\* | Ref  1.12 (0.97-1.31)  1.19 (0.98-1.44) |
| Mother’s occupation  Not working  Agriculture  Other sectors | Ref  1.03(0.90-1.18)  1.06(0.98-1.14) | Ref  1.06(0.91-1.23)  1.08(1.00-1.16)\* | Ref  0.74(0.63-0.87)\*\*\*  1.15(1.08-1.23)\*\*\* | Ref  0.84(0.71-0.99)\*  1.02(0.95-1.10) | Ref  0.96(0.88-1.04)  1.09(1.04-1.14)\*\* | Ref  1.02 (0.94-1.12)  1.05 (1.00-1.10) | Ref  0.78(0.63-0.97)\*  1.26(1.15-1.39)\*\*\* | Ref  0.95 (0.76-1.19)  1.08 (0.98-1.19) |
| Father’s education  No formal education/ primary  Secondary school  College/ higher | Ref  0.99(0.91-1.07)  1.03(0.93-1.13) | Ref  1.01(0.93-1.11)  1.06(0.95-1.20) | Ref  1.23(1.13-1.34)\*\*\*  1.54(1.39-1.69)\*\*\* | Ref  1.06(0.96-1.16)  1.15(1.02-1.31)\* | Ref  1.08(1.02-1.15)\*\*  1.17(1.09-1.25)\*\*\* | Ref  1.00 (0.94-1.06)  1.02 (0.94-1.12) | Ref  1.29(1.14-1.46)\*\*\*  1.78(1.54-2.06)\*\*\* | Ref  1.04 (0.91-1.19)  1.23 (1.03-1.46)\* |
| Infant’s age1, months | 1.18(1.12-1.24)\*\*\* | 1.19(1.13-1.25)\*\*\* | 1.34(1.29-1.40)\*\*\* | 1.36(1.31-1.42)\*\*\* | 1.00(0.97-1.03) | 1.00 (0.98-1.03) | 1.29(1.22-1.37)\*\*\* | 1.31 (1.24-1.39)\*\*\* |
| Infant’s sex, female | 1.03(0.97-1.10) | 1.05(0.98-1.12) | 1.06(0.99-1.13) | 1.04(0.98-1.11) | 0.97(0.93-1.02) | 0.97 (0.93-1.02) | 1.02(0.93-1.12) | 1.01 (0.92-1.10) |
| Birth interval2  No previous birth  < 24 months  ≥ 24 months | Ref  1.00(0.85-1.18)  0.98(0.91-1.05) |  | Ref  0.89(0.76-1.04)  0.92(0.86-0.98)\* |  | Ref  0.92(0.84-1.02)  0.93(0.89-0.97)\*\* |  | Ref  0.81(0.65-1.00)  0.87(0.79-0.95)\*\* |  |
| Birth order  1st child  2nd child  3th or more | Ref  0.97(0.89-1.06)  0.99(0.90-1.07) | Ref  1.00(0.93-1.09)  1.02(0.94-1.12) | Ref  0.95(0.87-1.02)  0.89(0.82-0.96)\*\* | Ref  0.99(0.92-1.07)  0.98(0.91-1.09) | Ref  0.95(0.90-1.00)\*  0.91(0.86-0.96)\*\*\* | Ref  0.96 (0.91-1.02)  0.95 (0.89-1.01) | Ref  0.91(0.81-1.01)  0.82(0.74-0.91)\*\*\* | Ref  0.96 (0.86-1.07)  0.93 (0.82-1.06) |
| Perceived birth size  Small  Average  Large | 1.00(0.89-1.13)  Ref  1.05(0.98-1.13) | 1.01(0.90-1.13)  Ref  1.05(0.98-1.12) | 0.98(0.89-1.08)  Ref  0.96(0.89-1.03) | 1.01(0.92-1.11)  Ref  0.98(0.92-1.05) | 0.98(0.91-1.05)  Ref  0.99(0.94-1.04) | 0.98 (0.92-1.05)  Ref  0.99 (0.94-1.04) | 0.98(0.85-1.12)  Ref  0.93(0.84-1.03) | 1.02 (0.89-1.67)  Ref  0.95 (0.86-1.06) |
| Place of delivery, health facility | 1.03(0.94-1.14) | 1.05(0.92-1.18) | 1.34(1.21-1.48)\*\*\* | 1.08(0.97-1.21) | 1.14(1.07-1.22)\*\*\* | 1.06 (0.98-1.15) | 1.46(1.27-1.69)\*\*\* | 1.05 (0.90-1.23) |
| Birth attendant, health professional | 1.02(0.89-1.17) | 0.96(0.81-1.14) | 1.68(1.38-2.04)\*\*\* | 1.25(1.01-1.55)\* | 1.19(1.06-1.34)\*\* | 1.03(0.90-1.10) | 2.20(1.64-2.94)\*\*\* | 1.48 (1.07-2.04)\* |
| Antenatal care3, n of visits  None  1-3  ≥4 | Ref  0.96(0.86-1.07) | Ref  0.92(0.82-1.04) | Ref  1.26(0.88-1.81)  1.52(1.10-2.10)\* | Ref  1.02(0.73-1.42)  1.07(0.79-1.46) | Ref  1.00(0.82-1.23)  1.15(0.96-1.39) | Ref  0.90 (0.74-1.10)  0.99 (0.82-1.18) | Ref  1.59(0.95-2.67)  2.32(1.45-3.71)\*\*\* | Ref  1.15 (0.70-1.88)  1.40 (0.88-2.21) |
| Postnatal care, yes | 1.08(0.98-1.18) | 1.08(0.99-1.18) | 1.02(0.95-1.09) | 0.98(0.91-1.05) | 1.11(1.06-1.17)\*\*\* | 1.09 (1.03-1.14)\*\* | 1.13(1.02-1.25)\* | 1.06 (0.96-1.17) |
| Reading newspapers/ magazines, yes | 1.02(0.95-1.10) | 1.01(0.94-1.08) | 1.23(1.16-1.30)\*\*\* | 1.10(1.02-1.17)\*\* | 1.09(1.05-1.14)\*\*\* | 1.04 (0.99-1.09) | 1.34(1.23-1.46)\*\*\* | 1.16 (1.05-1.28)\*\* |
| Listening to radio, yes | 1.03(0.96-1.10) | 1.01(0.94-1.08) | 1.11(1.04-1.18)\*\* | 1.03(0.97-1.10) | 1.01(1.01-1.11)\* | 1.02(0.96-1.06) | 1.13(1.03-1.24)\*\* | 1.00 (0.91-1.10) |
| Watching television, yes | 1.04(0.88-1.24) | 1.03(0.87-1.23) | 1.59(1.26-2.02)\*\*\* | 1.22(0.99-1.49) | 1.06(0.94-1.18) | 0.96 (0.86-1.08) | 1.70(1.22-2.36)\*\* | 1.21 (0.92-1.59) |
| Decision making4  0  1-3  4 | Ref  1.14(0.87-1.51)  1.13(0.86-1.50) | Ref  1.20(0.93-1.55)  1.22(0.95-1.57) | Ref  1.01(0.81-1.26)  1.03(0.83-1.28) | Ref  0.94(0.76-1.15)  0.95(0.78-1.16) | Ref  1.19(0.98-1.44)  1.19(0.99-1.44) | Ref  1.16 (0.96-1.39)  1.15 (0.96-1.38) | Ref  1.30(0.91-1.87)  1.29(0.90-1.86) | Ref  1.17 (0.83-1.65)  1.14 (0.81-1.60) |
| Attitude towards wife-beating5, nonconforming | 1.03(0.95-1.12) | 1.02(0.94-1.11) | 1.06(0.98-1.14) | 1.01(0.94-1.08) | 0.96(0.92-1.01) | 0.95 (0.91-1.00) | 1.07(0.97-1.18) | 1.01 (0.91-1.12) |
| *Household level* |  |  |  |  |  |  |  |  |
| Household wealth index6  Poor  Middle  Rich | Ref  0.01(0.91-1.08)  1.00(0.92-1.09) | Ref  0.93(0.85-1.02)  0.95(0.85-1.05) | Ref  1.20(1.10-1.31)\*\*\*  1.46(1.35-1.59)\*\*\* | Ref  1.06(0.97-1.17)  1.15(1.04-1.28)\*\* | Ref  1.08(1.02-1.15)\*\*  1.13(1.07-1.19)\*\*\* | Ref  1.02 (0.95-1.08)  1.01 (0.95-1.09) | Ref  1.31(1.15-1.49)\*\*\*  1.61(1.42-1.82)\*\*\* | Ref  1.09 (0.95-1.25)  1.13 (0.96-1.32) |
| Health insurance, yes | 1.04(0.98-1.12) | 0.95(0.89-1.02) | 0.91(0.85-0.97)\*\* | 1.03 (0.96-1.10) | 1.00(0.95-1.04) | 0.97 (0.93-1.02) | 0.86(0.78-0.94)\*\* | 1.06 (0.97-1.17) |
| *Community level* |  |  |  |  |  |  |  |  |
| Residence, urban | 1.03(0.96-1.11) | 1.05(0.97-1.14) | 1.19(1.11-1.27)\*\*\* | 1.01(0.94-1.08) | 1.12(1.07-1.17)\*\*\* | 1.09 (1.03-1.15)\*\* | 1.30(1.18-1.43)\*\*\* | 1.09 (0.98-1.20) |
| Geographical region  Java and Bali  Sumatera  Kalimantan and Sulawesi  Eastern regions7 | Ref  1.00(0.92-1.08)  0.94(0.86-1.04)  0.98(0.88-1.09) | Ref  1.02(0.94-1.10)  0.94(0.86-1.03)  1.00(0.89-1.13) | Ref  1.00(0.93-1.08)  0.89(0.81-0.97)\*  0.96(0.64-0.82)\*\*\* | Ref  1.04 (0.97-1.13)  0.94 (0.86-1.03)  0.82 (0.73-0.93)\*\* | Ref  0.97(0.91-1.02)  1.01(0.96-1.07)  0.96(0.90-1.03) | Ref  1.00 (0.94-1.06)  1.05 (0.99-1.11)  1.02 (0.95-1.10) | Ref  1.00(0.90-1.15)  0.88(0.78-0.99)\*  0.70(0.60-0.82)\*\*\* | Ref  1.06 (0.95-1.18)  0.95 (0.83-1.07)  0.83 (0.70-0.99)\* |

Values are presented as prevalence rate ratio (95% CI). Model I is the crude model, Model II is the fully-adjusted model (includes all covariates in Variables column except birth interval).

ISSSF, introduction of solid, semi-solid, and soft foods. MDD, minimum dietary diversity. MMF, minimum meal frequency. MAD, minimum acceptable diet; Ref, Reference.

1Fitted as continuous variable in the ISSSF analysis (values: 6, 7, and 8 months); an ordered categorical variable (values: 6-11, 12-17, and 18-23 m) treated as a continuous one in the analysis of MAD, MMF, and MAD.

2Not included in Model II due to multicollinearity (inclusion of this variable also does not change the final models in Table 4).

3Fitted as a categorical variable with 2 categories (<4 and ≥4 visits) for ISSSF analysis.

4Number of decisions that mothers took by herself or jointly with her partner.

5Nonconforming if mothers disagreed to at least one reason of wife-beating.

6Calculated based on selected assets, housing materials, water, and sanitation facilities in the households.

7All provinces in Nusa Tenggara, Maluku, and Papua.

\*P < 0.05; \*\*P < 0.01; \*\*\*P < 0.001.