**Supplementary Materials**

**Table S1.** Demographic and health-related characteristics of participants included and lost to follow-up in the analyses (CHNS 2004-2011)

|  |  |  |  |
| --- | --- | --- | --- |
| Characteristics\* | Subjects lost to follow-up | Subjects included | *P*† |
| No. of subjects | 1751 | 8758 |  |
| Age (y) | 47.4±15.2 | 49.4±12.8 | <0.001 |
| Male (%) | 50.3 | 48.7 | 0.21 |
| BMI (kg/m2) | 23.1±3.3 | 23.1±3.2 | 0.52 |
| Physical activity level (%)‡ |  |  | <0.001 |
| Light | 42.7 | 35.1 |  |
| Moderate | 27.5 | 30.9 |  |
| Vigorous | 29.9 | 34.1 |  |
| Cigarette smoker (%) | 32.6 | 34.3 | 0.18 |
| Alcohol consumption (%) | 35.7 | 34.6 | 0.41 |
| Education attained (%) |  |  | <0.001 |
| 0-6 y | 35.6 | 44.1 |  |
| 7-9 y | 35.2 | 32.4 |  |
| ≥10 y | 29.2 | 23.5 |  |
| Income level (%) |  |  | <0.001 |
| Low | 40.9 | 44.3 |  |
| Median | 32.6 | 34.6 |  |
| High | 26.5 | 21.1 |  |
| Urbanization index level (%) |  |  | <0.001 |
| Low | 31.3 | 40.0 |  |
| Median | 36.0 | 35.7 |  |
| High | 32.7 | 24.2 |  |
| Total legumes (g/1000 kcal) | 41.7±40.9 | 42.5±40.7 | 0.44 |
| Total fruits & vegetables (g/1000 kcal) | 168.2±98.5 | 176.1±100.4 | 0.003 |
| Total red meat (g/1000 kcal) | 36.2±34.8 | 31.5±30.6 | <0.001 |
| Total energy (kcal/d) | 2170.2±740.8 | 2247.4±709.3 | <0.001 |
| Diabetes, No. (%) | 1.3 | 1.2 | 0.52 |

BMI, body mass index; CHNS, the China Nutrition and Health Study.

\* Data are expressed as mean ± SD for continuous variables, or percentage (%) for categorical variables.

† Derived from tests of discrepancies between participants included and lost to follow-up, by t-test, Wilcoxin rank sum test, or chi-square test as appropriate.

‡ Energy expenditure on total physical activity; MET-h/wk (metabolic equivalent task hours for each week) was calculated by multiplying the amount of time spent in each activity with the average MET values of each category.

**Table S2.** Multivariate hazard ratios (95% CIs)\* of incident hypertension by categories of cumulative average total legume intake in various sensitivity analyses (CHNS 2004-2011)

|  |  |  |  |  |  |  |
| --- | --- | --- | --- | --- | --- | --- |
|  | **Levels of Total Legume Intake (g/1000 kcal)** | | | | | ***Ptrend*‡** |
| Non-consumers† | Q1 | Q2 | Q3 | Q4 |
| Recalculate person-years not using the middle point | 1.00 | 0.70  (0.55, 0.90) | 0.49  (0.38, 0.63) | 0.53  (0.41, 0.68) | 0.56  (0.44, 0.72) | <0.001 |
| Further adjust for baseline SBP and DBP | 1.00 | 0.78  (0.60, 1.00) | 0.51  (0.39, 0.66) | 0.58  (0.45, 0.75) | 0.59  (0.45, 0.76) | <0.001 |
| Further adjust for baseline sodium intake | 1.00 | 0.70  (0.55, 0.90) | 0.48  (0.37, 0.62) | 0.53  (0.41, 0.68) | 0.56  (0.43, 0.71) | <0.001 |
| Exclude participants with chronic metabolic diseases at baseline§ | 1.00 | 0.67  (0.52, 0.86) | 0.46  (0.35, 0.59) | 0.51  (0.39, 0.66) | 0.53  (0.41, 0.69) | <0.001 |

CI, confidence interval; Q, quartile; CHNS, the China Nutrition and Health Study; SBP, systolic blood pressure; DBP, diastolic blood pressure.

\* Covariates: age (continuous), gender, BMI (continuous), physical activity (tertiles of METs), education (≤6, 7-9, or ≥10 y), per capital household income (tertiles), urbanization index (tertiles), smoking (never/ever), alcohol drinking (never/ever), diabetes (yes/no), dietary intakes (continuous) of total energy (kcal/day), total fruits and vegetables, total red meat; for the 2nd sensitivity analysis, baseline SBP (continuous) and DBP (continuous) were further added as covariates; for the 3rd sensitivity analysis, baseline sodium intake (continuous) was further added as covariates.

† The non-consumers were set as the reference in all statistical models.

‡ *P* for trend values were calculated across the categories of total legume intake by dealing each ordinal score variable as a continuous variable in the model.

§ Chronic metabolic diseases include diabetes, apoplexy and myocardial infarction. After excluding participants with these conditions at baseline, 899 incident hypertension cases were identified during a total 35,477.5 person-years of follow-up.