SUPPLEMENTARY TABLES

Supplementary Table 1. Formula of the different diets used in the study.

A. AIN-93G diet (100%).

| Composition   | Weight(g) | Energy(kcal/kg) |
|---------------|-----------|-----------------|
| Corn Sugar    | 397.486   | 1589.944        |
| Casein Lactic | 200       | 800             |
| Granular Sugar| 100       | 400             |
| Dextrin       | 132       | 528             |
| L-Cystine     | 3         | 12              |
| Solka Floc-40 | 50        | 0               |
| Soy Oil       | 70        | 630             |
| Antioxidants  | 0.014     | 0               |
| AIN-93 Mineral Mix | 35  | 0               |
| AIN-93 Vitamin Mix | 10  | 40             |
| Choline Bitartrate | 2.5  | 0               |
| In total      | 1000      | 3999.944        |

B. High-calorie diet (125%).

| Composition   | Weight(g) | Energy(kcal/kg) |
|---------------|-----------|-----------------|
| Corn Sugar    | 197.486   | 789.944         |
| Casein Lactic | 200       | 800             |
| Granular Sugar| 100       | 400             |
| Dextrin       | 132       | 528             |
| L-Cystine     | 3         | 12              |
| Solka Floc-40 | 50        | 0               |
| Soy Oil       | 70        | 630             |
| Lard Oil      | 200       | 1800            |
| Antioxidants  | 0.014     | 0               |
| AIN-93 Mineral Mix | 35  | 0               |
| AIN-93 Vitamin Mix | 10  | 40             |
| Choline Bitartrate | 2.5  | 0               |
| In total      | 1000      | 4999.944        |

C. Low-calorie diet (80%).

| Composition   | Weight(g) | Energy(kcal/kg) |
|---------------|-----------|-----------------|
| Corn Sugar    | 317.486   | 1269.944        |
| Casein Lactic | 200       | 800             |
| Granular Sugar| 100       | 400             |
| Dextrin       | 132       | 528             |
| L-Cystine     | 3         | 12              |
| Solka Floc-40 | 180       | 0               |
| Soy Oil       | 20        | 180             |
| Antioxidants  | 0.014     | 0               |
| AIN-93 Mineral Mix | 35  | 0               |
| AIN-93 Vitamin Mix | 10  | 40             |
| Choline Bitartrate | 2.5  | 0               |
| In total      | 1000      | 3229.944        |
Supplementary Table 2. Detailed characteristics of the animal cohorts used in this study.

| Cohort | Calorie | Food quantity | Corn sugar | Soy oil | Lard oil |
|--------|---------|---------------|------------|---------|----------|
| HF     | 125%    | 100%          | 197g       | 70g     | 200g     |
| NF     | 100%    | 100%          | 397g       | 70g     | 0g       |
| LF     | 80%     | 100%          | 317g       | 20g     | 0g       |
| HDR    | 100%    | 80%           | 158g       | 56g     | 160g     |
| NDR    | 80%     | 80%           | 317g       | 56g     | 0g       |