

CODE:

```
#include <iostream>
```

```
using namespace std;
```

```
class DB;
```

```
class DM {
```

```
    float m, cm;
```

```
public:
```

```
    void read() {
```

```
        cin >> m >> cm;
```

```
    }
```

```
    void display() {
```

```
        cout << m << " meters " << cm << " centimeters\n";
```

```
    }
```

```
    friend DM add(DM d1, DB d2);
```

```
};
```

```
class DB {
```

```
    float ft, in;
```

```
public:
```

```
    void read() {
```

```
        cin >> ft >> in;
```

```
    }
```

```
    friend DM add(DM d1, DB d2);
```

```
};
```

```
DM add(DM d1, DB d2) {
```

```
float total_cm = d1.m * 100 + d1.cm + (d2.ft * 12 + d2.in) * 2.54;

DM result;

result.m = int(total_cm / 100);

result.cm = total_cm - result.m * 100;

return result;

}
```

```
int main() {

    DM d1;

    DB d2;

    cout << "Enter DM (m cm): "; d1.read();

    cout << "Enter DB (ft in): "; d2.read();

    DM result = add(d1, d2);

    cout << "Result: ";

    result.display();

    return 0;

}
```

OUTPUT:

Enter DM (m cm): 7 30

Enter DB (ft in): 5 11

Result: 9 meters 10.34 centimeters

[Program finished]