using System;

using System.Collections.Generic;

using System.Linq;

using System.Text.RegularExpressions;

namespace \_03\_NetherRealms

{

public class Deamons

{

public string Name { get; set; }

public long Health { get; set; }

public decimal Damage { get; set; }

}

public class NetherRealms

{

public static void Main()

{

var deamons = Console.ReadLine()

.Split(new char[] { ' ', ',', '\t'}, StringSplitOptions.RemoveEmptyEntries)

.ToArray();

var deamonList = new List<Deamons>();

var pattern1 = @"[+-]?(\d+\.\d+|\d+)";

var numsRegex = new Regex(pattern1);

var healthPattern = @"[^\d\-\*\/\.]";

var healthRegex = new Regex(healthPattern);

foreach (var deamonName in deamons)

{

MatchCollection healths = healthRegex.Matches(deamonName);

var changedName = deamonName;

var damage = 0.0m;

var health = 0L;

foreach (Match ch in healths)

{

health += (long)char.Parse(ch.ToString());

}

MatchCollection numbers = numsRegex.Matches(deamonName);

foreach (Match num in numbers)

{

damage += decimal.Parse(num.ToString());

}

foreach (var letter in deamonName)

{

if (letter == '\*')

{

damage \*= 2;

}

else if (letter == '/')

{

damage = damage / 2.0m;

}

}

var theDeamon = CreateNewDeamon(deamonName, damage, health);

deamonList.Add(theDeamon);

}

deamonList = deamonList.OrderBy(d => d.Name).ToList();

foreach (var deamon in deamonList)

{

Console.WriteLine($"{deamon.Name} - {deamon.Health} health, {deamon.Damage:F2} damage");

}

}

public static Deamons CreateNewDeamon(string deamonName, decimal damage, long health)

{

var newDeamon = new Deamons

{

Name = deamonName,

Damage = damage,

Health = health

};

return newDeamon;

}

}

}