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#include <iostream>

#include <cmath>

using namespace std;

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long long x,y,z,a,b,c,p,q,n,k,i,j,ok,u,f,t;

int main()

{

    for(f=1; f<=5; f++){

        cin>>a>>b>>c>>x>>n;

        for(u=1; u<=n; u++){

            cin>>y;

            q=x;

            ok=1;

            k=0;

            t=1;

            if(x<=6 and x+y>8){

                ok=0;

                for(i=x+1; i<=x+y and t; i++)

                    if(i%y==0 and (i!=a and i!=b and i!=c) )

                        x=i,t=0;

            }

            else if(x<=11 and x+y>13){

                ok=0;

                for(i=x+1; i<=x+y and t; i++)

                    if(i%y==0 and (i!=a and i!=b and i!=c) )

                        x=i,t=0;

            }

        }

    }

}

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else if(x<=16 and x+y>18){
    ok=0;
    for(i=x+1; i<=x+y and t; i++)
        if(i%y==0 and (i!=a and i!=b and i!=c) )
            x=i,t=0;
}
if(x<=26 and x+y>27){
    ok=0;
    for(i=x+1; i<=x+y and t; i++)
        if(i%y==0 and (i!=a and i!=b and i!=c) )
            x=i,t=0;
}
else if(x<=34 and x+y>36){
    ok=0;
    for(i=x+1; i<=x+y and t; i++)
        if(i%y==0 and (i!=a and i!=b and i!=c) )
            x=i,t=0;
}
else if(x<=39 and x+y>41){
    ok=0;
    for(i=x+1; i<=x+y and t; i++)
        if(i%y==0 and (i!=a and i!=b and i!=c) )
            x=i,t=0;
}
else if(x<=44 and x+y>46){
    ok=0;
    for(i=x+1; i<=x+y and t; i++)
        if(i%y==0 and (i!=a and i!=b and i!=c) )
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        x=i,t=0;
    }
else if(x<=49 and x+y>=51){
    ok=0;
    for(i=x+1; i<=x+y and t; i++)
        if(i%y==0 and (i!=a and i!=b and i!=c) )
            x=i,t=0;
    }
if(ok==1){
    for(j=2; j*j<=x+y; j++)
        if((x+y)%j==0)
            k=1;
    if(k==0){
        p=x+y;
        if(p!=a and p!=b and p!=c){
            for(i=1; i<=6; i++)
                if(p+1==a or p+1==b or p+1==c)
                    break;
                else
                    p=p+1,ok=0;
            x=p;
        }
    }
}
if(ok==1){
    if(x+y>4 and sqrt(x+y)==(int)sqrt(x+y)){
        p=x+y;
        if(p!=a and p!=b and p!=c){
            for(i=1; i<=6; i++)

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        if(p-1==a or p-1==b or p-1==c)
            break;
        else
            p=p-1,ok=0;
        x=p;
    }
}
}
if(ok==1){
    p=x+y;
    if(p==a or p==b or p==c)
        x=p-y;
    else
        x=p;
}
if(x>52)
    x=q;
}
if(x>=52)
    cout<<"GAME OVER"<<"\n";
else
    cout<<x<<"\n";
}
}
```