下記JSのコードはループがちゃんと回りません。どこがおかしいですか？

function calculateRepayment() {

var a = parseFloat(document.getElementsByName("repaymentYears")[0].value);

var b = parseFloat(document.getElementsByName("repaymentMonths")[0].value) || 0;

var totalMonths = a \* 12 + b; // 返済期間を月数に変換

var c = parseFloat(document.getElementsByName("holdMonths")[0].value); // 元金据え置き期間を月数に変換

var r = parseFloat(document.getElementsByName("interestRate")[0].value);

var monthlyInterest = r / 12 / 100; // 金利を月利に変換

var x = parseFloat(document.getElementsByName("loanAmount")[0].value);

var monthlyInterestRepayment = x \* 10000 \* monthlyInterest; //毎月の利息金額

var totalInterest = monthlyInterestRepayment \* totalMonths; //利息合計

var totalRepayment = x \* 10000 + totalInterest; //全体の返済額

var monthlyprincipalRepayment = x \* 10000 / (totalMonths - c); // 毎月の元金返済額

var repaymentSchedule = []; //毎月の返済額をリストにする

var repaymentSchedulePrincipal = []; //うち元金

var repaymentScheduleInterest = []; //うち利息分

for (var i = 0; i < c; i++) {

repaymentSchedule.push(Math.round(monthlyInterestRepayment));

repaymentScheduleInterest.push(Math.round(monthlyInterestRepayment));

}

for (var i = c; i < totalMonths; i++) {

repaymentSchedule.push(Math.round(monthlyprincipalRepayment + monthlyInterestRepayment));

repaymentScheduleInterest.push(Math.round(monthlyInterestRepayment));

repaymentSchedulePrincipal.push(Math.round(monthlyprincipalRepayment));

}

document.getElementsByName("totalRepayment")[0].value = totalRepayment.toLocaleString();

document.getElementsByName("totalInterest")[0].value = totalInterest.toLocaleString();

console.log(monthlyprincipalRepayment);

console.log(repaymentSchedule);

for (var i = 0; i <= 5; i++) {

var yearlyRepaymentAmount = 0;

var yearlyInterestRepayment = 0;

var yearyPrincipalRepayment = 0;

var startMonth = i\*12;

var endMonth = startMonth + 12;

for (var j = startMonth; j < endMonth; j++) {

if (j < repaymentSchedule.length) {

yearlyRepaymentAmount += parseFloat(repaymentSchedule[j]);

yearlyInterestRepayment += parseFloat(repaymentScheduleInterest[j]);

yearyPrincipalRepayment += parseFloat(repaymentSchedulePrincipal[j]);

} else {

yearlyRepaymentAmount += 0;

yearlyInterestRepayment += 0;

yearyPrincipalRepayment += 0;

}

}

document.getElementsByName("yearlyRepaymentAmount\_" + i)[0].value = yearlyRepaymentAmount.toLocaleString();

document.getElementsByName("interestpaid\_" + i)[0].value = yearlyInterestRepayment;

document.getElementsByName("PRINCIPAL\_" + i)[0].value = yearlyRepaymentAmount.toLocaleString();

document.getElementsByName("yearlyPrincipalRepayment\_" + i)[0].value =yearyPrincipalRepayment.toLocaleString();

document.getElementsByName("PRINCIPAL\_" + i)[0].value =yearyPrincipalRepayment.toLocaleString();

document.getElementsByName("yearlyInterestRepayment\_" + i)[0].value = yearlyInterestRepayment.toLocaleString();

console.log(repaymentSchedule);

}

}

このコードでは、repaymentSchedulePrincipalという配列が初期化されていないため、ループが正しく回りません。repaymentSchedulePrincipalは元金返済額を格納するための配列ですが、初期化が行われていないため、要素が存在しない状態でアクセスされてしまいます。

修正するには、repaymentSchedulePrincipalを初期化するためのコードを追加する必要があります。修正後のコードは以下のようになります：

// 省略...

var repaymentSchedulePrincipal = []; //うち元金の配列を初期化

for (var i = 0; i < c; i++) {

repaymentSchedule.push(Math.round(monthlyInterestRepayment));

repaymentScheduleInterest.push(Math.round(monthlyInterestRepayment));

repaymentSchedulePrincipal.push(0); // 初期値として0を追加する

}

// 省略...

この修正により、repaymentSchedulePrincipalの要素が適切に設定され、ループが正しく回るようになります。