

# Caso 4

**ESCOLA DE EDUCACAO FISICA**  
**UNIVERSIDADE DE SAO PAULO**

Avenida Professor Melo Moraes, 85 - Tel. 813-5711

**ECG DE REPOUSO E TESTE ERGOMETRICO**

EXAME N.: F 595  
DATA: 02/08/95

PACIENTE :  
INDICACAO: Dr. PROF.CLAUDIA

**DADOS PESSOAIS:**

IDADE: 47 anos  
PESO: 64 kg  
INDIVIDUO: Sedentario

SEXO: Mas  
ESTATURA: 1.71 m

**CONDICOES PARA O TESTE:**

HORA: 15:00  
TEMP.: 22 °C  
MARCAPASSO: Nao  
FC MAXIMA: 173 BPM

ERGOMETRO: Bicicleta  
PROTOCOLO: ESCALONADO-30W/CADA 3'  
DERIVACOES: MV5, D2M, e V2M  
FC SUBMAXIMA: 147 BPM

**FINALIDADE:**

AVALIACAO FUNCIONAL CARDIORRESPIRATORIA

**DADOS CLINICOS:**

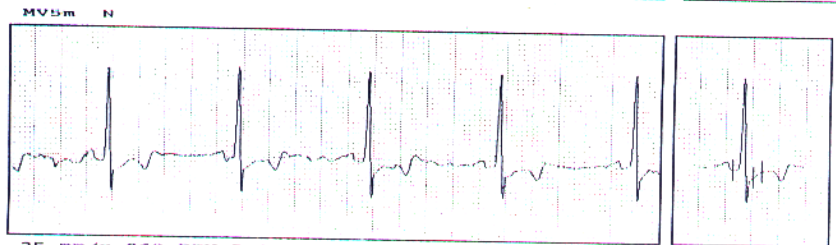
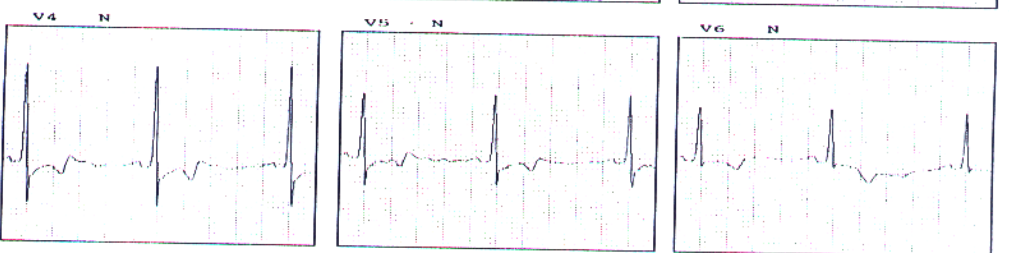
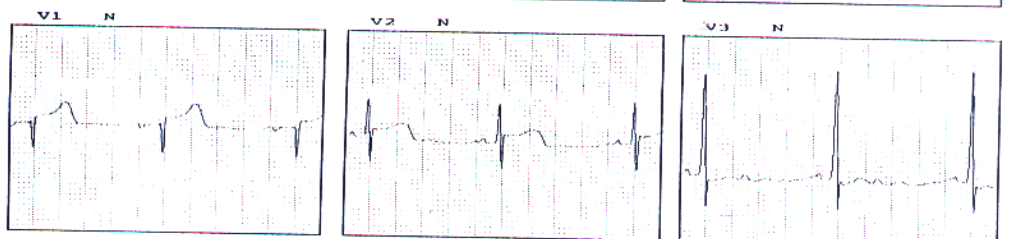
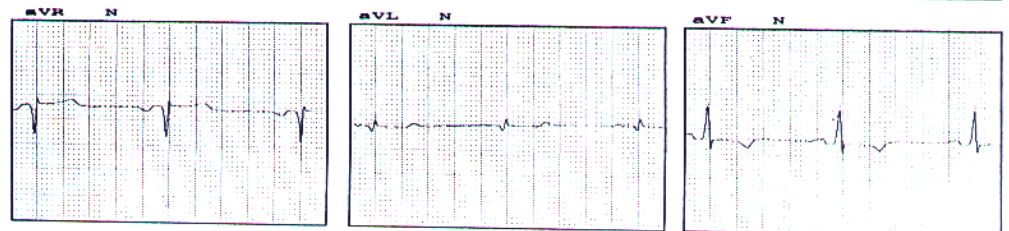
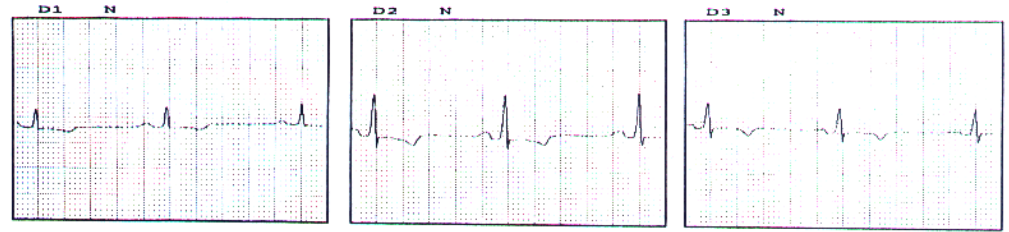
HAS

**MEDICAMENTOS EM USO:**

PRESSO HC-01 COMP. DIA

RESPONSAVEL: Dr. ANA MARIA BRAGA

ECG DE REPOUSO



D = -0.5  
 I = 1.3  
 R = 1.8

25 mm/s 60 BPM P=000/000 00:00

60Hz

MUSC

## RESULTADOS DO TESTE

ESTAGIO	TEMPO	FC	PS	PD	ESTAGIO	TEMPO	FC	PS	PD
Pre Esforço	- 00:00	69	150	100	3'120W60RM	- 15:20	148	230	105
3'REPOUSO	- 03:01	68	0	0	Recuperacao	- 01:02	127	220	110
1'30W60RPM	- 04:00	85	0	0	Recuperacao	- 02:03	113	210	100
2'30W60RPM	- 05:00	84	0	0	Recuperacao	- 04:01	101	195	100
3'30W60RPM	- 05:59	90	170	110	Recuperacao	- 06:01	88	170	100
2'60W60RPM	- 08:02	122	0	0					
3'80W60RPM	- 09:09	111	200	110					
1'90W60RPM	- 10:13	114	0	0					
3'90W60RPM	- 12:03	124	205	105					
2'120W60RM	- 13:57	142	0	0					

## ADOS PARA O CALCULO DOS PARAMETROS

Carga Maxima: 120 Watts  
Pre Avaliacao: Sadio  
Frequencia Maxima : 148 BPM

PS no Pre Esforço : 150 mmHg  
PS Maxima no Esforço: 230 mmHg

## PARAMETROS METABOLICOS

VO<sub>2</sub>max=----- ml/(kg min) ----- MET  
MVO<sub>2</sub> =----- ml/(100gVE min)  
GRUPO FUNCIONAL : I  
APTIDAO CARDIORESP.: Regular

## FORMULAS UTILIZADAS

$(12 \times \text{Carga} + 300) / \text{Peso}$  (/3.5=METS)  
DP x 0.0014 - 6.3

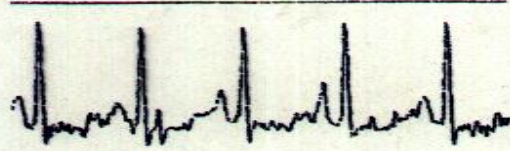
## PARAMETROS HEMODINAMICOS

DUPLO PRODUTO = 34040  
DEBITO CARDIACO = 13.3 l/min  
VARIACAO DA PA = 10.3 mmHg/MET  
DEFICIT CRONOTROPICO = 14.5 %  
DEFICIT FUNCIONAL VE = -1.7 %

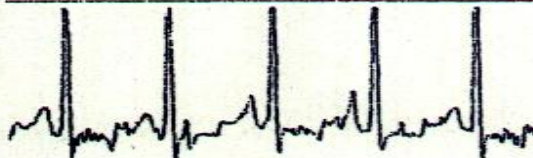
## FORMULAS UTILIZADAS

$(\text{PSmax Esforço}) \times \text{Frequencia}$   
 $\text{VO}_{2\text{max}} \times \text{Peso} \times 4.6 + 5.31$   
 $(\text{PSmax} - \text{PSpre}) / (\text{Numero de METs})$   
 $100(\text{FCprevista} - \text{FCalcancada}) / \text{FCprev.}$   
 $100(\text{DPprevisto} - \text{DPalcancado}) / \text{DPprev.}$

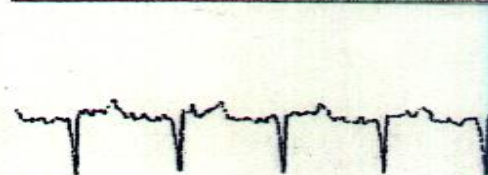
DURANTE ESFORCO



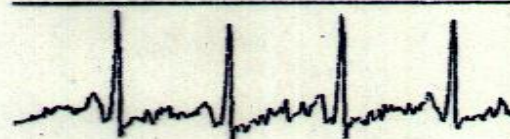
75 N V=25 P= /



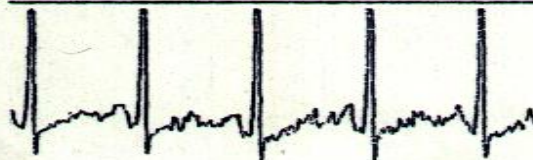
D2M N T=08:02 F=122



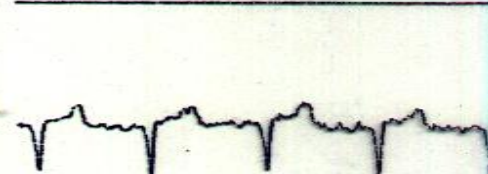
V2M N EST.2'60W6ORP



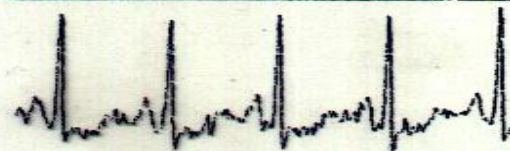
75 N V=25 P=200/110



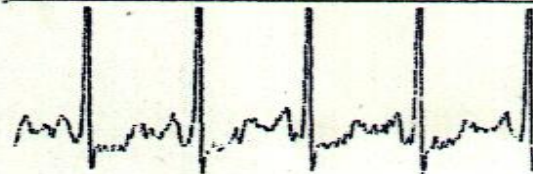
D2M N T=09:09 F=111



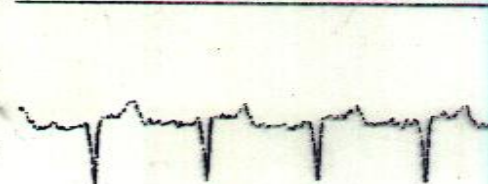
V2M N EST.3'60W6ORP



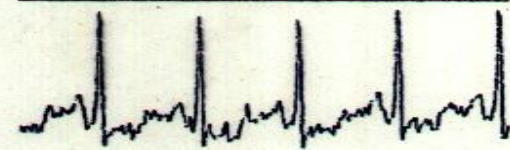
75 N V=25 P=.



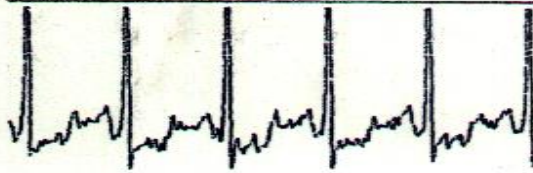
D2M N T=10:13 F=114



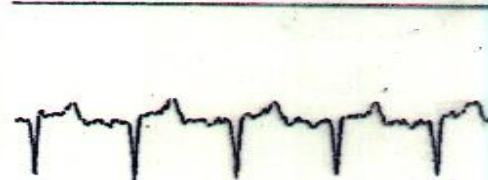
V2M N EST.1'90W6ORP



75 N V=25 P=205/105



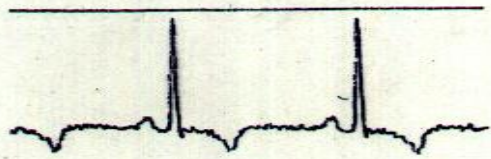
D2M N T=12:03 F=124



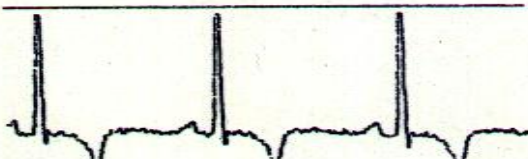
V2M N EST.3'90W6ORP



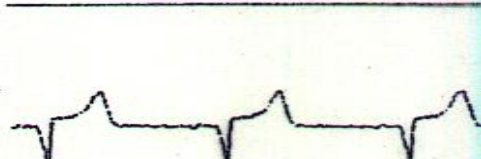
DURANTE ESFORCO



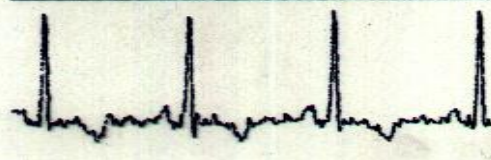
5 N V=25 P= /



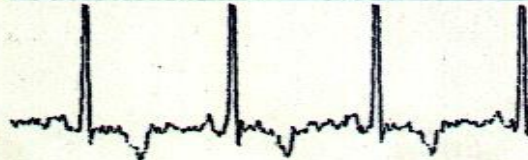
D2M N T=03:01 F= 68



V2M N EST. 3' REPOUSO



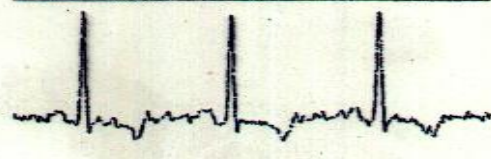
5 N V=25 P= /



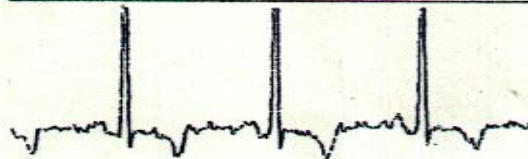
D2M N T=04:00 F= 85



V2M N EST. 1' 30W60RP



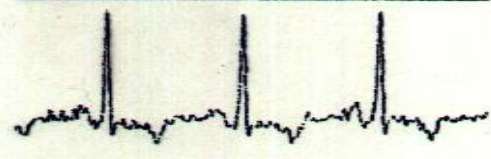
5 N V=25 P= /



D2M N T=05:00 F= 84



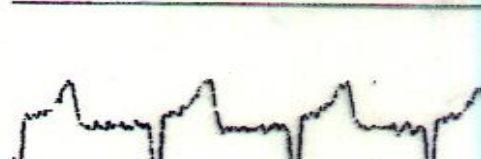
V2M N EST. 2' 30W60RP



5 N V=25 P=170/110

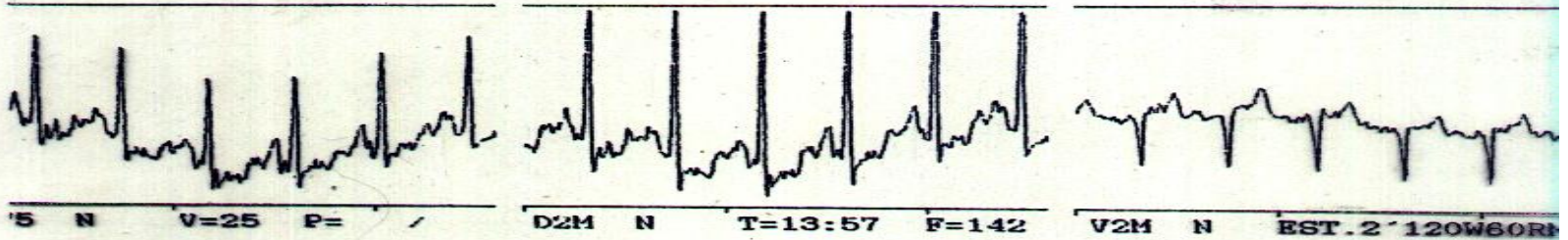


D2M N T=05:59 F= 90



V2M 2N EST. 3' 30W60RP

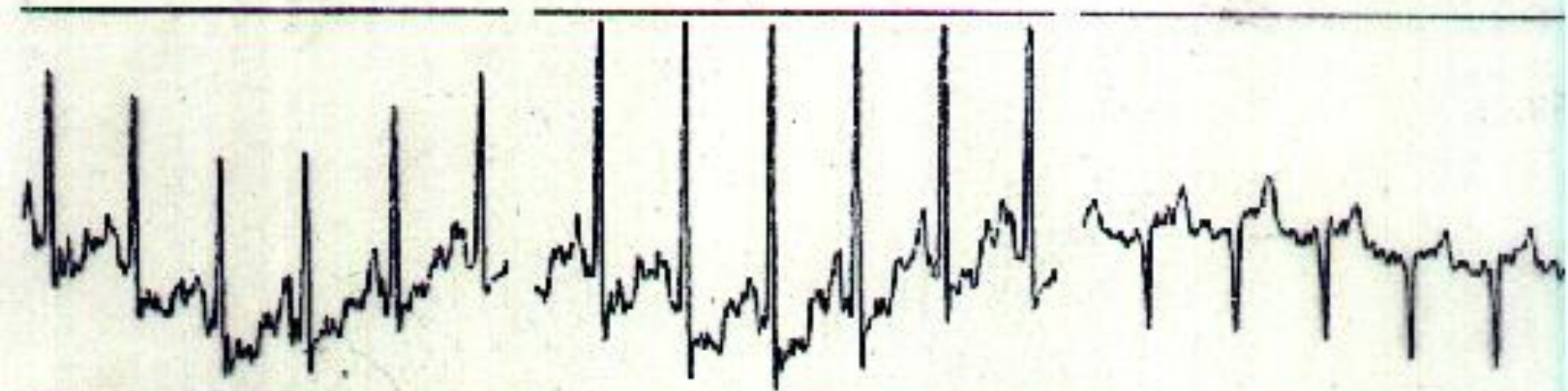
DURANTE ESFORÇO



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AME N.F 596      PACIENTE:

TRM - 010  
02/08/8

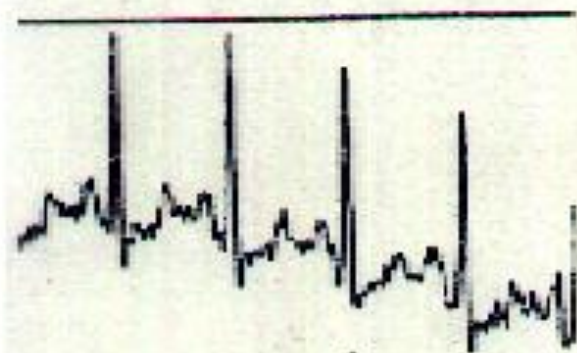
DURANTE ESFORÇO



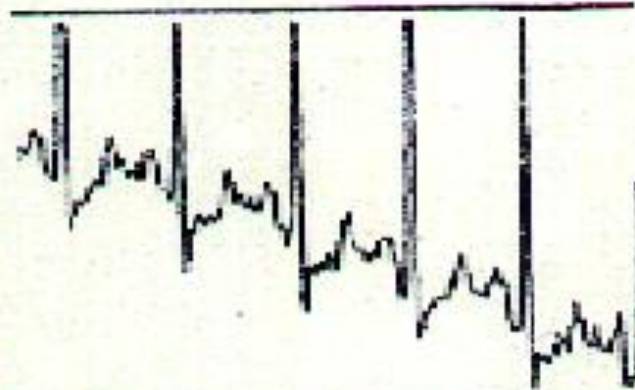
V5 N V=25 P= /      D2M N T=13:57 F=142      V2M N EST.2'120W60R



APÓS ESFORÇO



5 N V=25 P=220/110



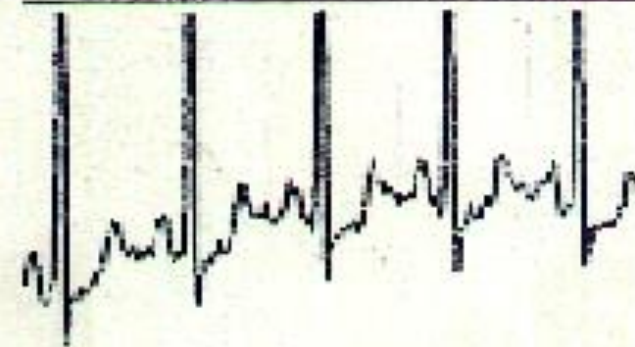
D2M N T=01:02 F=127



V2M N



5 N V=25 P=210/100



D2M N T=02:03 F=113



V2M N

ANALISE DO TESTE

PARAMETROS CLINICOS

CANSACO FISICO INTENSO E FREQUENCIA CARDIACA SUBMAXIMA ATINGIDA, MOTIVO PELO QUAL O TESTE FOI INTERROMPIDO.  
AUMENTO ACENTUADO DA PAS E AUSENCIA DE EFEITO VASODILATADOR EM RELA -  
CAO A PAD.

PARAMETROS ELETROCARDIOGRAFICOS

ECG DE REPOUSO:

ALTERACOES DIFUSAS DA REPOLARIZACAO VENTRICULAR. SUPRADESNIVELAMENTO DO ST EM V1 E V2 COM INFRADESNIVELAMENTO DO ST EM V4 E V5, *NO REG. REPOUSO.*

DURANTE ESFORCO:

ATINGIU 86% DA MAXIMA FREQUENCIA CARDIACA PREVISTA PARA A IDADE.  
HORIZONTALIZACAO DO SEGMENTO ST EM MC5 E D2M, SUGESTIVO DE RESPOSTA TIPO ISQUEMICA.

RECUPERACAO:

HORIZONTALIZACAO DO SEGMENTO ST SUGESTIVO DE RESPOSTA TIPO ISQUEMICA.

CONCLUSOES E COMENTARIOS

*(FC 114)*  
TESTE POSITIVO, NA PRESENCA DE HIPERTENSAO ARTERIAL SISTEMICA.

VIDE OBSERVACOES DOS PARAMETROS CLINICOS E ELETROCARDIOGRAFICOS.

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