





## NEW ELECTRONICS - NEW IMPROVED TRANSPORT NEW VERSATILITY - NEW ONE-YEAR WARRANTY

The new 602 is a field recorder that will go where you go — and give you the reliability and professional studio-quality you need when you get there! For rack mounting in the studio it uses minimal rack space.

New advancements in the famous, performance-proven Ampex 600 series!

602-1

ONE CHANNEL RECORDER

Choose full or half-track heads. A rugged, dependable recorder that will meet your performance requirements for a professional mono unit. 602-2

TWO CHANNEL RECORDER

Two-track heads with selective-track erase head, two electronic channels, give you the versatility of 2-track stereo and half-track mono in one unit.

622

SPEAKER/AMPLIFIER

Gives you "on-the-spot" studio-quality playback for demonstration or monitoring . . . 10-watt amplifier gives ample volume for a medium size auditorium.

# AMPEX

602 SERIES PROFESSIONAL FIELD RECORDERS





# 602 SERIES

### PROFESSIONAL FIELD RECORDER



- Improved Transport
- Built-in Low Impedance Mike Transformer
- Record/Safe Switch on Each Channel of 602-2
- · Redesigned Clutches Give up to 10 Times Longer Life
- · Cool Operation, Silicon **Diode Rectifiers**
- Hysteresis Synchronous **Drive Motor**
- DC Filament for Low Noise



#### VERSATILITY ...TO DO WHAT YOU WANT

- · monitor tape or source while recording (separate heads, separate record and playback amplifiers).
- · separate mixing controls for mike and line (two mikes can be mixed on one channel with accessory plug-in preamp in line circuit).
- · horizontal or vertical operation.
- large, 3" professional VU meter(s) for monitoring during recording or playback.
- · will feed 600 ohm remote broadcast line.



#### PORTABILITY ...TO GO WHERE YOU GO

- · lightweight, mono model weighs only 28 pounds.
- easy-to-carry case, built for lasting durability.
- sturdy, die-cast parts, high-quality components, and safety factors well above specifications, assure reliable operation during rugged operating conditions in field use ... even after rough handling.
- electronic adjustments accessible through "window" in rear of portable case.



#### DEPENDABILITY ...YOU CAN COUNT ON

- · uses time-proven basic Ampex 600 transport design — accepted as the world-wide standard for portable recorders.
- will cost less per hour than re-corders of lesser quality, because it will require fewer adjustments and fewer parts replacements.
- both 602 recorders and 622 speaker/amplifiers are covered by the new Ampex "Four Star" ONE YEAR WARRANTY with full protection on parts for a year.

Essentially flat acoustically, range better than 65-10,000 cps.

10 watts amplifier power with no audible harmonic distortion. Speaker can handle full power.

Amplifier noise (including hum), 70 db below rated

Volume control, bass-treble control, power switch and on-off indicator light. Built-in AC convenience outlet. Audio input connector is concentric pin type. External speaker connection is headphone type jack.

Single control on front panel provides adjustment, boosting bass and attenuating treble or vice versa. Maximum bass boost 6 db relative to treble. Maximum treble boost 6 db relative to bass.

Use of "SPEAKER" jack automatically cuts out the 622's internal speaker and reciprocal network. Flat amplifier output is fed to the external speaker.

Inputs, 100,000 ohms. Output, 12 ohms to external speaker.

117 volts, 50 or 60 cycles, 0.5 amps, 55 watts.

622

602-2

Special design 8" full-range speaker.

#### SPECIFICATIONS / 602 SERIES

Measured by professional standard methods. These are the guaranteed minimum specifications the user can expect in long-term operation.

FREQUENCY RESPONSE:

SIGNAL-TO-NOISE RATIO:

40 to 15,000 cps; down no more than 4 db at 15,000;  $\pm 2$  db from 40 to 10,000 cps at  $74/\!\!\!/_2$  ips.  $33\!\!\!/_4$  ips model +2 -4 db from 40 to 8,000 cps.

Model 602-1: with full track head, over 57 db; with half-track head, over 55 db. Model 602-2: over 55 db. All at 74/2 ips.

FLUTTER AND WOW:

Less than 0.17% at  $7\frac{1}{2}$  ips; less than 0.25% at  $3\frac{3}{4}$  ips (measured at ASA standard).

TIMING ACCURACY:

 $\pm$ 0.2% at 7½ ips ( $\pm$ 3.6 seconds in a 30 minute recording).

FAST FORWARD OR FAST REWIND TIME: HEADS:

90 seconds for full 1200-foot reel.

Three separate heads: erase, record, playback. Model 602-1: Full-track or half-track Model 602-2: Two-track heads

71/2 ips model or 33/4 ips model.

SPEEDS: 7" and 5" REEL SIZE:

INPUTS (each channel)

b. Line input (100K unbalanced), —10 dbm required for program record level.

formers.

OUTPUTS (each channel):

a. +4 dbm into 600 ohm. Balanced or unbalanced load.

EQUALIZATION:

For 117 volt, 60 cps models: 7½ ips, NAB; 3¾ ips, 120 microsecond. For 115/230 volt, 50 cps models: 7½ ips (19 cm/s), NAB or CCIR; 3¾ ips (9.5 cm/s), 120 or 200 microsecond.

POWER REQUIREMENTS:

Models for 117 v., 60 cps; 115/230 v., 50 cps. Model 602-1, 70 volt-amperes; Model 602-2, 105 volt-amperes.

WEIGHT (in case):

U.L. APPROVED

#### SPECIFICATIONS / **622 SPEAKER-AMPLIFIER**

OVERALL FREQUENCY RESPONSE (in air):

SPEAKER SIZE: POWER OUTPUT:

SIGNAL-TO-NOISE

CONTROLS & CONNECTIONS:

**EQUALIZATION:** 

EXTERNAL SPEAKER FEED:

DIMENSIONS / 602-1

Electronic top area: 61/8" x 121/2" (two electronic sections in Model 602-2).

Transport top area: 9-5/16" x 121/2"

Overall size, including carrying case: Model 602-1: 8" x 1334" x 161/2"

Model 602-2; 8" x 133/4" x 23"

Depth below top plate: 5"

IMPEDANCE: POWER REQUIREMENT:

WEIGHT:

Two inputs, individual gain controls on each.
a. low impedance mike input, 150 microvolts required for program record level (for use with mikes of 30 to 250 ohms nominal impedance).

All inputs are Cannon XL connectors. Provision for use of plug-in balanced line or bridging input transfer

Line input can be used as input for second micro-phone by accessory plug-in preamplifier (allowing 2 microphnes to be mixed on one channel).

b. Head phone jack (on front panel). Monitor selector knob permits monitoring from either the input source or the tape playback, while record-

Model 602-1: 28 lbs. Model 602-2: 42 lbs.

Ampex 600 Series recording tape recommended for optimum performance.

AMPEX

Ampex equipment may be purchased or lea under special Ampex finance pla

#### **AMPEX CORPORATION**

Rack Space: will mount in standard 19" width rack, with appropriate Ampex adapter

Model 602-1 with #864 Adapter Panel, takes only 17½" of vertical rack space. Model 602-2 with #865 Adapter Panel, takes only 23¾" of vertical rack space. Model 622 speaker/amplifier, overall size in carrying case: 13" x 16" x 8"

PROFESSIONAL AUDIO PRODUCTS

401 Broadway • Redwood City • California • 94063

Offices and representatives in principal cities throughout the world.

25 pounds U.L. APPROVED