

PSYCHOLOGY

To Swing Off to War

Sentimental Songs Will No Longer Bring Enlistments Say Experts, Citing Rise of New Demands in Tempo

By EMILY C. DAVIS

AMERICAN doughboys may march to the next war to swing music—if America is drawn into fighting any time soon.

No more "Tipperary." No sentimental "Long, Long Trail."

With swing, the soldiers come down the street keeping time to drumming. "Feverish, voodoo drumming" such music has been called. Then the band breaks into a tune. It's a swing polka. Saxophones take it and the military tramp matches the nervous, excited rhythm of the horns. Then, the band "throws the trumpets out the window" and the whole formation is swung into high thrill by that brassy climax.

Swung off to war! But why?

The answer is: Because it will take more sophisticated and streamlined music to get enlistments for another war.

Authority for this forecast is the Institute for Propaganda Analysis with headquarters in New York. The Institute doubts that tear-jerker songs will arouse any enthusiasm in the Veterans of Future Wars. The VFWs cherish no rosy illusions of war's glories.

Analyzing propaganda, to teach Americans how to become a nation of critical thinkers, is the mission in life of the Institute. It has worked with 350 high school classes, also adult groups in colleges, and farm, civic, and professional organizations.

Definitions

And if you are mentally casting about for a neat two-word definition of propaganda, just to fix in mind what the thing is, probably that's a waste of time. The Institute has a collection of definitions. Most of them sound as if a corporation lawyer drew them up. Propaganda may be good. It may be bad. That depends on its use. Either way, it's an effort to get across information or ideas to people, in hope of influencing them.

Martial music is a good example of how rhythms can influence people. The tramp, tramp song wasn't put into warfare when the American Revolution started. If it had, George Washington's

task might have been easier, the Institute points out. That rhythm gets into the blood, inspiring volunteers.

Professional soldiery was the usual thing in the eighteenth century. "Yankee Doodle" was a simple, playful march—and it still is. It's the military rhythm that you hear on the stage, when the stalwart troopers march by and the pretty girls wave. It's tin soldier music, nowadays.

But revolutionists discovered what bugles could do, with the "to arms" or "arise" cry put into bugling. Result was the French "Marseillaise" and the American "Star-Spangled Banner."

The bugle call effect in George M. Cohan's "Over There" is credited by the Institute with helping win the World War.

All styles of military meter were tried in the World War, including dance rhythms that appealed to our Spanish War era.

Marches Still Swingless

The U. S. Army Band is still playing its Sousa marches straight—not swung—and disclaims any attempt to try swinging military march tunes. Musical preparedness is mostly of the technical variety. It would be hard to invent and practise music of the right psychology for vaguely future "emergencies."

The music in speech is playing a big role in international affairs swaying nations, the Institute points out. Never before in human history has the musical art of speech been so cultivated by those in power, declares the organization's educational director, Violet Edwards, in a new publication.

Dictators issue personal orders to millions of subjects. Even speeches that turn into blah when analyzed, may carry the crowd by their eloquence, and accomplish their purpose, she points out. Obviously, in these cases the voice does something that print could not achieve.

"The microphone," says Miss Edwards, "came too late for Woodrow Wilson, who stood mute and helpless before milling throngs of people who could only get his arguments for the League of Nations by reading the papers."

She would like to see the power that

lies in words and music investigated in joint research by musicians, actors, speakers, dramatists, psychologists and sociologists.

"The time is ripe," she urges "for a needed study of these arts by which war psychology and extreme nationalism have been fostered since the French Revolution."

She also recommends that Americans get a better idea of forces that mold our society today by scrutinizing history and literature to see how people have been influenced in the past. The Boston Tea Party was action propaganda, in an American time of stress. Shakespeare's Macbeth and his ambitious wife were maladjusted people, fighting frustration. Their drama shows what people would fight for, and kill for, in those days.

When modern Americans idealize movie stars and athletes, they are drawn toward something that means to them conquest of fear. At least that's the way the situation is seen by Miss Edwards. Ideals are often fears in reverse, she concludes. Medieval Anglo-Saxons were inspired by the traditional hero Beowulf, because, just like the successful actor or ball player, Beowulf outwitted special insecurities of his time. Today that means making money, having a glamor career. With Beowulf it was slaying wild beasts and tossing off physical hazards with super courage and efficiency.

Powerful Appeals

With average Americans today, the appeals that are apt to carry the most influence are mainly these, it has been figured out. And you'll notice in the list emotional desires that influence a good many people you know, whether or not you think you are susceptible yourself:

To be popular.

To be with the crowd.

To get as much as possible for as little effort as possible. The scientific term for that is efficiency.

To get as much as possible for as little money as possible. Economy, in short.

Luxury, sex, appetite, curiosity—these round out the list of outstanding desires.

But there's a negative side, too; a string of fears that strike home to the average human. Major fears include:

Fear of being poor.

Fear of being ugly.

Fear of being neglected, or left out of the crowd.



TEMPO

Soldiers' marching feet went off to the last war to such sentimental tunes as "There's a Long, Long Trail," but the next war in which America may be involved will need a new type of rhythm. In the beating feet of current jitterbug dances (top) and the music that makes them click experts see potentially America's wartime music of the future.

Fear of social disapproval.

And if you'd like to know what the seven common devices are for appealing to these almost sure-fire fears and desires, here's the list:

Name calling; using glittering generalities; suggesting by transfer that you can be like some admired person; testimonials; the plain folks line; card stacking; and the appeal to jump on the band wagon.

With life as complicated as it is today, and millions of people trying to run a democracy, there's no escaping propaganda, so the Institute concludes. The thing to do, as they see it, is to avoid being gullible. That means becoming a nation of critical thinkers, who make decisions after scrutinizing what we read, hear, or are told. They'd like propaganda analysis to become an American habit.

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CHEMISTRY

Natural Gas Yields New Family of Useful Chemicals

NOT often does chemistry present industry with a whole new assortment of chemicals, capable of extensive use in various fields, although single new chemical compounds, undreamed of in nature, are frequently produced. That is the reason chemists are somewhat excited by the development of the nitroparaffins by Commercial Solvents Corporation research. For they constitute a whole group of chemical compounds entirely different from any which have been available before.

The basic raw material for the manufacture of the new chemicals is natural gas, large quantities of which are being wasted daily. Methane, ethane, propane and other principal constituents of nat-

ural gas have been very difficult to entice into chemical combination. In fact they have been called the paraffins (par-affin meaning "no affinity") because of their inertness. What we commonly know as paraffin, the solid wax petroleum, is of the same chemical family.

Successful nitration of these gases by a new technique has produced nitromethane, nitroethane and four other similar compounds. They are colorless, mild-odored, heavy liquids which boil at slightly higher temperatures than water's boiling point. From these nitroparaffins a variety of chemicals are being made, while the new chemicals themselves are also proving useful.

A new explosive that may rival TNT

can be made from nitromethane, by reacting it with formaldehyde to form a nitrotrialcohol, which can be nitrated. This possibility first brought the nitroparaffins to public attention.

The nitroparaffins are direct and active solvents for nitrocellulose and for a wide range of synthetic and natural resins as well as for fats and some dyes. Mixed with alcohols, they are solvents for commercial cellulose acetates. Nitroethane is a heat sensitizer which brings about the gelling of rubber latex, while chlorinated nitroparaffins are anti-gelling agents, useful in rubber cements.

Market surveys indicate, according to Arthur D. Little, Inc., that ammonia derivatives of nitroparaffins may command markets in many industries for use in manufacture of synthetic organic chemicals.

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MEDICINE

New X-Ray Procedure Helps Fight Tuberculosis

A NEW X-ray procedure which promises to help in the fight on tuberculosis was described by Drs. Israel Steinberg, George P. Robb and Ursula J. Roche, of New York City, at the meeting of the National Tuberculosis Association in Boston.

The new method may enable doctors to determine the effect of lung collapse therapy, one of the new methods of treating tuberculosis, on the physiology of blood circulation in the lungs, and even to evaluate effectiveness of this treatment.

"It seems certain," the inventors of the method said, "that many problems in pulmonary disease which previously have been studied only in animals or in autopsy material may now be investigated during life."

The new procedure consists of injecting a concentrated solution of diodrast rapidly into the veins. This substance makes the veins opaque so they can be seen in the X-ray picture. Within a matter of seconds, the heart and the veins and arteries of lungs and chest of a normal person can be seen by this procedure.

Striking decreases in the number of veins carrying blood away from the involved areas of the lungs were found to be characteristic of pulmonary tuberculosis. Other changes in the lung arteries were seen.

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An electric eel at the New York World's Fair zoological exhibit is capable of electrocuting a man, and attendants handle it with rubber gloves.