

which this gas will at once put out. Fill a bubble with air; let it fall upon the acid gas. It will remain supported—seemingly upon nothing, for the air is invisible—as long as any of the gas is left. If you could fill a bubble with hydrogen, it would bound upward at a great rate; for that gas is the lightest known.

Let us now look at the colours in our bubble. How beautiful they are, dancing and flashing so fast, changing so rapidly we cannot begin to count them! But we know that white light—that is, sunlight—is composed of seven colours. They can all be seen in the rainbow.

Let a beam of light fall upon the bubble. Part of the light passes right through, or is absorbed, and part is at once thrown back or reflected. The portion of the film that absorbs all the colours, and reflects or throws back only the blue will appear blue, and so on for all the others. And as the thickness of the film changes, the absorption and reflection of the light changes, so it is that our bubble sparkles with all the beautiful and delicate tints of the rainbow.

Adding more glycerine will make the colouring even more brilliant. Indeed, our bubbles can be made perfectly gorgeous.—*Christian at Work.*

THE CRUCIAL TEST.

DEEPLY learned, fresh from school,
Comes my all-accomplished daughter!
Newly freed from bookish rule,
Say what wisdom have they taught her?
"Ologies I care not for,
Mystic science, classic lore,
So she be but skilled enough in
Homely arts to toast my muffin.

Knows she, as her mother knew,
Recip-s and quaint directions!
How to bake, to boil, to brew
Dainty syrups, sweet confections,
Or, as others of her sex,
Born and nurtured but to vex.
Scarcely knows she of such stuff in
Nature as untoasted muffin!

Have they trained her to pursue
Pastimes merely ornamental?
And, with pricely retinue,
To expend a Rothschild's rental?
Can she nothing do but dance,
Paint on china, dream romance?
Well, perhaps I grow too rough in
Expectation of my muffin.

Come, then, pretty maid, at once
Prove my jealous fears unfounded;
Make me own myself the dunce,
All my gibes on envy ground.
Yet one warning word believe,
Mind of men can naught conceive
So unconquerably tough, in
Human ken, as half-cooked muffin.

LUTHER'S COURAGE.

AS Luther drew near the door which was about to admit him into the presence of his judges (the Diet of Worms), he met a valiant knight, the celebrated George of Freudsberg, who, four years later, at the head of his German lansquenets, bent the knee with his soldiers on the field of Pavia, and then charging to the left of the French army, drove it into the Ticino, and in a great measure decided the captivity of the king of France. The old general, seeing Luther pass, tapped him on the shoulder, and shaking his head, blanched in many battles, said kindly: "Poor monk, poor monk! thou art now going to make a bolder stand than I or any other captains have ever made in the boldst of our battles. But if thy cause is just, and thou art sure of it, go for-

ward in God's name, and fear nothing. God will not forsake thee." A noble tribute of respect paid by the courage of the sword to the courage of the mind.—*Merle D'Aubigne.*

THE FRESH-AIR FUND.



HE sketch and poem explain the story of Little Dot, given in a late number.

Close by the river, at the foot of a dismal street, stands a big shed, in which eighteen families eat and sleep. It is a quarter of New York where decent people are seldom seen. On every side there are shanties and rookeries, and the air is heavy with sickening smells from slaughter-houses. Dirt is everywhere: a foul ooze of garbage and standing water in the gutter; solid layers of dust, dark entries which are never scratched by a broom; heaps of unclean straw serving for pillow and bed in the closets which are known as bedrooms; and thick coatings of grime, ancient and modern, on the hands and faces of the children swarming about the door-ways, as well as in the shreds, tatters, and patches with which they are scantily clothed. The midsummer sun heats up the piles of refuse until they steam with foul vapors, which are caught up by the windows; and when the doors leading into the halls are opened for a draught of fresh air, there is a stifling sense of closeness and dampness, which makes the babies sneeze and the mothers cough. The long wooden building, with its three floors and rickety staircases, is so unsteady and tottering that one who watches it in the noontime heat of a July day fairly holds his breath, expecting to hear a sudden crash and to see its ragged roof and dingy walls fall to pieces, disappearing in a cloud of dust.

That ugly shed is known as "The Barracks." Rubbish heap though it be, it contains within its patched and slimy shell eighteen homes, with as many as sixty children. On each of its three floors there are six families, and no household has more than two rooms, one of them being barely larger than a closet, and as dark as night even in the day-time. In those two rooms the cooking and washing for the family are done, and at night the father, mother, and sometimes as many as six or eight children, have to sleep close together, like sardines in a box. "The Barracks" is but one of the hundreds of tenement houses where the children of the poor live all the year round.

The children in these tenement houses always look older than they really are.

The childhood which accords with their years, if not with their faces, can not be permanently restored to them, for poverty is their birthright, and every season brings with it privations and misery. But if they can be helped to be children for two weeks in the year, the memories of their holiday and the renewed health which it gives to them will make them younger as well as healthier and happier. If, when the scorching midsummer sun falls with a white glare upon the thin roofs and flimsy walls of their tenement homes, the children can be taken out of the narrow closets where they sleep, and the steaming gutters where they swarm like big black flies, and set

down in the centre of the children's play-ground, which is the country, a new glow will be kindled in their cheeks, and they will be the children they were meant to be—not little old men and little old women.

Now, this is the work of what is called "The Tribune Fresh-Air Fund." People who are rich or have moderate means furnish the money for the children's travelling expenses, sending it to "The Tribune" newspaper. Last summer there were more than fifteen hundred generous persons, many of them children themselves, who gave money for this purpose, the contributions amounting to \$21,556.91. With this sum, 5,599 of the poor children of New York were taken into the country, given a holiday of two weeks, and carried back to their tenement homes. While their travelling expenses were paid by the contributors to the Fund, the children were the invited guests of farmers and other hospitable people living in the country. During the spring, seventy-five public meetings were held in as many villages in New York, Connecticut, New Jersey, Massachusetts, Vermont, and other States, and arrangements were made with committees and clergymen in as many other localities; and when the kind-hearted entertainers in the country were ready to receive them, the children were sent out from the city in large companies, and distributed among the villages.

The manager of the Fresh-Air Fund is Willard Parsons, a bachelor clergyman, who has adopted the poor children of New York for his own. Hale and hearty, with a ruddy face and an eye twinkling with good humour, he has a heart brimful of kindness for neglected children, and the energy of twenty men. He it was who devised this simple and effective plan of entertaining in the country the poorest of poor children living in New York and Brooklyn. The experiment was tried six years ago, when he had a country parish in Pennsylvania, and now he is making this the business of his life. The first year, sixty children were taken into the country. Last year, 6,000 children had an outing in green fields and pastures new. It is a charity as popular as it is beautiful, for every heart is touched by the sorrows of neglected childhood.—*St. Nicholas.*

A BEAUTIFUL CHARITY.

A SUMMER morning, cool and fair;
A whiter soft in the sunny air,
And a sound of rippling laughter.
A distant patter of dancing feet;
A chorus of eager voices sweet,
And a happy silence after.

A motley, merry crowd of youth,
With garments ragged and worn, forsooth,
But never a step that lingers.
Lads and lasses in laughing bands,
Babies that hold to guiding hands,
With clinging, anxious fingers.

Faces merry, or grave, or sad,
Lit up with expectation glad—
Where are the children going!
Away from dust, and noise, and heat,
The bustling city's narrow street,
With crowded life o'erflowing.

To sunny fields of daisied grass,
Where cool the fitful breezes pass
Above the blossoms leaning.
Where, far from walls and boundaries,
With birds and butterflies and bees,
They learn the summer's meaning.

Under the wonderful blue sky,
The mighty arms of tree tops high,
In green woods arching over;

Where spicy perfumes lightly stray,
In breezy meadows of new mown hay,
And fields of purple clover.

On sandy shores beside the sea,
Where roll the tides incessantly,
And dancing ripples glisten—
Where whispering shells repeat the tale
The ocean thunders in the gale,
To rosy ears that listen

Sorrowful, wistful, patient eyes
Grow bright with rapturous surprise,
Or soft with happy wonder,
And she looks as white as the winter snows
Blossom in tints of brown and rose,
The summer sunshine under.

Wise Mother Earth to sad young hearts
Her choicest gifts of all imparts,
Their careful thoughts beguiling;
She breathes her secrets in their ears—
Their eyes forget the smart of tears,
And catch the trick of smiling.

They learn sweet lessons, day by day,
While speed the winged hours away,
In gray and golden weather;
They find, in flower or bird or tree,
Faint gleams of the beautiful mystery
That clasps the world together.

Perchance some serious, churlish eyes,
Uplifted to the starlit skies,
Read there a strange, new story;
And dimly see the Love that holds
The round world safe, and o'er it folds
The mantle of His glory.

A distant patter of dancing feet,
A chorus of happy voices sweet,
Amid the summer splendor.
Glad voices, rise through all the land!
Reach out, each little sunburned hand,
In greeting warm and tender.

To those whose thoughtful hearts and true
Have lightened lovingly, for you,
Your poverty's affliction;
And on each helpful spirit be
For this—the lovely charity—
The children's benediction!

—*St. Nicholas.*

BIRDS AND THEIR NESTS.

DIFFERENT species of birds have their distinctive ways of building. For instance, the common wren builds a nest like a ball, with a side entrance, while that of the golden-crowned wren is flat, open on top, made of moss, covered with leaves, and lined with feathers, hair, and wool.

The saucy little house-sparrow builds its nest under the eave of a house, and the hedge-sparrow chooses the fork of a spreading bush.

Among the weaver-birds—those which form the materials into a coarse, fibrous tissue—are the tailor bird, whose nest is placed in a large leaf, the sides of which are sewed together, and the oriole. The Baltimore oriole makes a pouch, and suspends it from the upper branch of a shrub or tree; but the nest of the crested, New World oriole, is of dry grasses, woven into long sacks, increasing in size toward the bottom, with an elongated side-slit. These nests are sometimes two yards long, and hang from trees. Although the opening is small, the bird has no difficulty in entering while on the wing.

The sociable, or republican bird, resembles a sparrow. Large numbers unite and form immense colonies. Their dwellings resemble an open umbrella, having the trunk of a tree for the handle. The cells are arranged round the edge, sometimes to the number of three hundred. These nests are so heavy that a cart, with many men, has been employed in transporting one of their colonies.

Listening to these little songsters, and observing their wonderful ways, how can we ever raise the hand of cruelty against them!